20 DECEMBER 2011

ANNEX V TO RESPONSES TO COMMENTS DOCUMENT (RCOM) ON ECHA'S DRAFT 3RD RECOMMENDATION FOR THE GROUP OF RECOMMENDED COBALT(II) SUBSTANCES - COMMENTS ON COBALT(II) DIACETATE (EC NUMBER: 200-755-8)

THIS DOCUMENT PROVIDES THE COMMENTS RECEIVED ON COBALT(II) DIACETATE DURING THE PUBLIC CONSULTATION ON THE 3RD DRAFT RECOMMENDATION FOR INCLUSION OF SUBSTANCES IN ANNEX XIV OF REACH WHICH TOOK PLACE BETWEEN 15 JUNE AND 14 SEPTEMBER 2011. ECHA'S RESPONSES TO THESE COMMENTS ARE PROVIDED IN THE ABOVE MENTIONED RCOM DOCUMENT.

N.B.: All public attachments are provided in a separate zip-file available on ECHA's website (attachments claimed confidential are not provided with the public version of this compilation of comments received).

I - GENERAL COMMENTS ON THE RECOMMENDATION TO INCLUDE THE SUBSTANCE IN ANNEX XIV, INCLUDING THE PRIORITISATION OF THE SUBSTANCE:

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1829	2011/09/14 21:46 File attached Confidential	Cobalt REACH Consortium Ltd (CoRC)/Cobalt Development Institute (CDI) Industry or trade association United Kingdom	The Secretariat of the Cobalt REACH Consortium Ltd (CoRC) has prepared a Technical Annex for this cobalt substance to support the Joint Response Comments that have been submitted (separately) into the current consultation. The preparation of the Joint Response Comments has involved participation of the Consortium member companies who are the major manufacturers/importers of cobalt substances in Europe, as well as several Downstream Users that are also members of the Consortium. Further information has also been collected from industry stakeholders using two surveys: a stakeholder mapping survey, and a supply/value chain study. These studies were undertaken in order to collate and refine information available from the cobalt industry on volumes, exposure and uses. The surveys were cascaded along the supply chains to gather a more complete picture of the uses and supply/value chains than has been available previously. Information collected from the responses to these two surveys has been

			combined and summarised and is presented in the supporting Technical Annex to the Joint Response Comments. A copy of the Technical Annex document has been submitted into the current consultation as a CONFIDENTIAL attachment. The Consortium has also prepared a collation of the short-form versions of the Exposure Scenarios for this cobalt substance as an appendix to the Technical Annex. A copy of this accompanying document is also provided as a CONFIDENTIAL attachment. There are two other appendices to the Technical Annex which include papers that present further information regarding the threshold mechanism for cobalt compounds, and the essentiality of cobalt compounds. These two papers have been submitted into the current consultation (separately) as attachments to the response comments provided by the CDI (Cobalt Development Institute).
1806	2011/09/14 20:50 File attached	ACEA - European Automobile Manufacturers Association Industry or trade association Belgium	According to the available data we see no basis for an inclusion of the hard chromium plating from Chromium trioxide (-solutions) in Annex XIV of the REACH regulation. See also attached Joint association letter sent to ECHA Executive Director on 20th October 2010.

1783	2011/09/14 19:43 File attached Confidential	Company Germany	Kobalt(II)-salze finden bei mbw in den Cr(III)-haltigen Passivierungslösungen für Zn- und Zn-Legierungsschichten Anwendung. Vorrangig wird dabei Kobalt(II)-nitrat verwendet. Andere Kobaltsalze sind für die o. g. Passivierungen jedoch grundsätzlich möglich. Arbeitsschutz: Bei sachgemäßer Anwendung der kobalthaltigen Lösungen und Verwendung der vorhandenen persönlichen Schutzausrüstung besteht keine Gefährdung für die Mitarbeiter. Die persönliche Schutzausrüstung besteht dabei aus geeigneter Arbeitskleidung sowie chemiebeständigen Handschuhen. Aufgrund der vorhandenen Absaugeinrichtungen kann eine Gefährdung durch Stäube und/oder Nebel ausgeschlossen werden. Alternativverfahren: Aufgrund der hohen Korrosionsschutzanforderungen an Zink- und Zinklegierungsschichten gibt es zu kobalthaltigen Passivierungslösungen keine adäquaten Alternativen. Passivierungsschichten ohne Kobalt erfüllen die Anforderungen der Kunden, welche vorrangig aus der Automobilindustrie stammen, nicht. Vergleichbare Korrosionsergebnisse können nur mit Chrom(VI)-haltigen Lösungen erreicht werden. „Mit der EU-Richtlinie 2000/53/EG des Europäischen Parlaments über Altfahrzeuge sowie nachfolgend der EU-Richtlinie 2002/95/EG (Elektroschrottverordnung) wurde der Einsatz von Chromatierschichten für Pkw und Elektrobauteile verboten.“ (Quelle: Kommentar des Zentralverbandes Oberflächentechnik e.V. (ZVO) zum Thema Vorschlag zur Priorisierung von Cobalt(II)-sulphate, Cobalt(II)-dinitrate, Cobalt(II)-dichloride, Cobalt(II)-acetate und Cobalt(II)-carbonate zur Aufnahme in den Anhang XIV der REACh Verordnung im Zuge der public consultation bis zum 14.09.2011 - Einsatz der zweiwertigen Kobaltsalze in KONVERSIONSSCHICHTEN In der europäischen GALVANOTECHNIK. – als Anlage hochgeladen) Weitere Betrachtungen In dem als Anlage hochgeladenen bereits oben zitierten Kommentar des ZVO sind die Auswirkungen für die Wirtschaft zu entnehmen. Dem ist grundsätzlich nichts hinzuzufügen. Die Erzeugung von in kobalthaltigen Lösungen passivierten Zink- und Zinklegierungsschichten erfolgt branchenübergreifend für viele Kunden. Einen hohen Anteil stellen dabei international agierende Partner der Automobil- und Fensterbeschlagindustrie dar. Bei einen Verbot der Kobaltsalze entsteht der mbw-Gruppe ein deutlicher internationaler Wettbewerbsnachteil. Auch die Auswirkungen auf die bestehenden nationalen Geschäftsbeziehungen dürften erheblich sein. Die Fortführung der Geschäftsbeziehung ist damit erheblich gefährdet. Verbunden damit ist die Gefährdung der ca. 300 Arbeitsplätze der mbw-Gruppe.

			Einen hohen Anteil des Umsatzes wird mit Kunden aus der Automobil- und Fensterbeschlagindustrie erzielt. Bei einen Verbot der Kobalt(II)-salze wäre die mbw-Gruppe mit ca. 300 Mitarbeitern deutschlandweit so stark betroffen, dass eine Fortführung der Geschäftsbeziehungen und somit der Erhalt der Arbeitsplätze ernsthaft gefährdet ist. „Ein Verbot des Einsatzes von Kobaltsalzen in Passivierungen würde den Korrosionsschutz der beschichteten Teile deutlich vermindern und damit negative Auswirkungen auf die Langlebigkeit und Nachhaltigkeit des industriellen Wirtschaftens in Europa haben. Verstärkter Rohstoffeinsatz und zusätzlicher Energieverbrauch wäre die Folge und würde die europäischen Klimaschutzziele und Senkungsbestrebungen zum CO2 Ausstoß belasten." (Quelle: Kommentar des Zentralverbandes Oberflächentechnik e.V. (ZVO) zum Thema Vorschlag zur Priorisierung von Cobalt(II)-sulphate, Cobalt(II)-dinitrate, Cobalt(II)-dichloride, Cobalt(II)-acetate und Cobalt(II)-carbonate zur Aufnahme in den Anhang XIV der REACh Verordnung im Zuge der public consultation bis zum 14.09.2011 - Einsatz der zweiwertigen Kobaltsalze in KONVERSIONSSCHICHTEN In der europäischen GALVANOTECHNIK. – als Anlage hochgeladen)
1735	2011/09/14 18:22	The Cobalt Development Institute Industry or trade association United Kingdom	CDI Comments for ECHA Public Consultation for Cobalt Salts – September 2011 The Cobalt Development Institute (CDI) is an international organisation of a wholly non-profit making character which has been in existence for over 50-years. The CDI is an association of producers, users and traders of cobalt. The CDI has the following objectives: (1) Promoting the responsible and sustainable use of cobalt in all forms. (2) Consulting organisations, agencies and governments for research or investigations in all matters concerning cobalt. (3) Providing members with topical information on all cobalt matters including health & safety and environmental legislation plus regulatory affairs possibly affecting their interests. (4) Promoting co-operation between members and providing a forum for the exchange of information concerning the resources, production and uses of cobalt. Membership of the CDI includes 32 member companies from 16 countries including all the major cobalt producers. The Board of the CDI has also established three Cobalt REACH Consortia to implement REACH on behalf of the cobalt industry. A separate wholly-owned subsidiary of the CDI called CoRC (Cobalt REACH Consortium Ltd.) acts as the Secretariat to the Consortia. This submission is being made in conjunction with formal submissions made by CoRC on behalf of the Members of the Cobalt REACH Consortium, and we also provide a confidential

			Technical Annex relating to this cobalt salt. REACH has many ambitions and compelling aims to protect EU citizens and workers from exposure to chemicals, and these are supported by Industry. Over the past five years since adoption of the REACH regulation, the cobalt industry has taken its responsibility to comply with the financial, technical, scientific and administrative burden. By 1st December, 2010 the registration of cobalt and the relevant cobalt compounds (18 in total) had been completed and we are currently continuing with our efforts to ensure that we contribute to the evaluation process. The Cobalt Consortium has already expended some Euro 7million and work continues for the remaining twelve substances covered by the Consortium. The Dossier (Technical Annex)(i) prepared for cobalt diacetate shows that: - the actual tonnage of cobalt diacetate used in the EU market is significantly lower (10x) than quoted in the ECHA consultation document from REACH registration data. - it is used as a catalyst (70 to 80 % of EU tonnage) in the manufacture of terephtalic acid (PTA), dimethyl terephthalate (DMT), isophtalic acid (IPA) and oxidation catalyst for other processes. - other uses are as an intermediate for the production of other chemicals (~5%), surface treatment (
1851	2011/09/14 18:22 File attached	The Cobalt Development Institute Industry or trade association United Kingdom	CDI Comments for ECHA Public Consultation for Cobalt Salts – September 2011 The Cobalt Development Institute (CDI) is an international organisation of a wholly non-profit making character which has been in existence for over 50-years. The CDI is an association of producers, users and traders of cobalt. The CDI has the following objectives: (1) Promoting the responsible and sustainable use of cobalt in all forms. (2) Consulting organisations, agencies and governments for research or investigations in all matters concerning cobalt. (3) Providing members with topical information on all cobalt matters including health & safety and environmental legislation plus regulatory affairs possibly affecting their interests. (4) Promoting co-operation between members and providing a forum for the exchange of information concerning the resources, production and uses of cobalt. Membership of the CDI includes 32 member companies from 16 countries including all the major cobalt producers. The Board of the CDI has also established three Cobalt REACH Consortia to implement

			REACH on behalf of the cobalt industry. A separate wholly-owned subsidiary of the CDI called CoRC (Cobalt REACH Consortium Ltd.) acts as the Secretariat to the Consortia. This submission is being made in conjunction with formal submissions made by CoRC on behalf of the Members of the Cobalt REACH Consortium, and we also provide a confidential Technical Annex relating to this cobalt salt. REACH has many ambitions and compelling aims to protect EU citizens and workers from exposure to chemicals, and these are supported by Industry. Over the past five years since adoption of the REACH regulation, the cobalt industry has taken its responsibility to comply with the financial, technical, scientific and administrative burden. By 1st December, 2010 the registration of cobalt and the relevant cobalt compounds (18 in total) had been completed and we are currently continuing with our efforts to ensure that we contribute to the evaluation process. The Cobalt Consortium has already expended some Euro 7million and work continues for the remaining twelve substances covered by the Consortium. The Dossier (Technical Annex)(i) prepared for cobalt diacetate shows that: - the actual tonnage of cobalt diacetate used in the EU market is significantly lower (10x) than quoted in the ECHA consultation document from REACH registration data. - it is used as a catalyst (70 to 80 % of EU tonnage) in the manufacture of terephtalic acid (PTA), dimethyl terephthalate (DMT), isophtalic acid (IPA) and oxidation catalyst for other processes. - other uses are as an intermediate for the production of other chemicals (~5%), surface treatment (

1709	2011/09/14 17:45 File attached Confidential	SurTec Deutschland GmbH Company Germany	"Comments by The Central Association of Surface Treatment Professionals Germany (ZVO)on the subject of Proposals for Prioritising Cobalt (II) Sulphate, Cobalt (II) Dinitrate, Cobalt (II) Dichloride and Cobalt (II) Acetate for Inclusion in Appendix XIV of the REACH Regulations in connection with the public consultation up to 14 September 2011 Application of divalent cobalt salts in Conversion layers in the European electroplating Industry"
1668	2011/09/14 16:41 File attached	FEFANA asbl and TREAC EEIG Industry or trade association Belgium	

1651	2011/09/14 16:20	Equipolymers Company Italy	Equipolymers is a manufacturer of PET (Polyethylene Terephthalate), which is a polyester resin used as the packaging material of choice for mineral water and beverages, plus for a large number of food and non-food packaging applications. PET is also the most recycled plastic packaging material in Europe. We are members of CPME (Committee of PET Manufacturers in Europe). We understand that the main use of cobalt(II) diacetate is as a catalyst in the production of PTA (Terephthalic Acid) and IPA (Isophthalic Acid) , which are intermediates for the manufacture of polyester fibres. In our position of polyester resin producers, we are downstream users of both PTA and IPA. We understand from our suppliers that cobalt(II) diacetate is the only available catalyst for oxidation of p-xylene and m-xylene to PTA and IPA, respectively. We understand and accept the classification of cobalt diacetate as reiterated by the ECHA proposal but note that the carcinogenicity classification is restricted to exposure by the inhalation route. We are in close relationship with our suppliers of PTA and IPA and have been reassured that cobalt acetate is produced and transported as a solution, handled in closed systems thus specifically excluding the inhalation route and is recovered at the end of the oxidation process,. According to our suppliers, the way cobalt diacetate is currently used as a catalyst is such to avoid any risk for people, workers and the environment.
1648	2011/09/14 16:12	Portugal MemberState Portugal	Taking into consideration the high volume and the wide dispersion use of substance cobalt(II) diacetate, we consider that this substance fullfills the prioritisation criteria. The results of the scoring approach supports this conclusion. We therefore support ECHA's recommendation for inclusion of this substance in annex XIV. We also support the proposed application and sunset date.

1586	2011/09/14 14:51 File attached	Sønderborg Fornikling Company Denmark	Vorschlag zur Priorisierung von Cobalt(II)-sulphate, Cobalt(II)-dinitrate, Cobalt(II)-dichloride, Cobalt(II)-acetate und Cobalt(II)-carbonate zur Aufnahme in den Anhang XIV der REACh Verordnung seite 7
1561	2011/09/14 14:31 File attached	HFJ Galvano Kiel GmbH Company Germany	Kommentar des Zentralverbandes Oberflächentechnik e.V. (ZVO) zum Thema Vorschlag zur Priorisierung von Cobalt(II)-sulphate, Cobalt(II)-dinitrate, Cobalt(II)-dichloride, Cobalt(II)-acetate und Cobalt(II)-carbonate zur Aufnahme in den Anhang XIV der REACh Verordnung im Zuge der public consultation bis zum 14.09.2011 Einsatz der zweiwertigen Kobaltsalze in KONVERSIONSSCHICHTEN Seitenzahl 7

1555	2011/09/14 14:27 File attached	COVENTYA GmbH Company Germany	Die Verwendung von Cobalt(II)-sulphate, Cobalt(II)-dinitrate, Cobalt(II)-dichloride, Cobalt(II)-acetate und Cobalt(II)-carbonate ist für die Herstellung unserer für die Oberflächenbehandlung relevanten Produkte unabdingbar. Die Ausführungen der Kommentierung des ZVO (siehe Anhang) stimmen voll und ganz mit den Argumenten und Forderungen der Coventya GmbH überein. Auf eine Auflistung wird hier verzichtet und wir verweisen auf die Kommentare des Zentralverbandes Oberflächentechnik e. V. (ZVO) „Einsatz der zweiwertigen Kobaltsalze in Konversionsschichten in der europäischen Galvanotechnik" und „Einsatz von Cobalt(II)-sulphate, Cobalt(II)-dinitrate, Cobalt(II)-dichloride, Cobalt(II)-acetate und Cobalt(II)-carbonate in Elektrolyten zur elektrochemischen Reduktion in der europäischen Galvanotechnik". Die Coventya GmbH kann auf Grund der in den Kommentaren aufgeführten Argumenten (siehe Anhang) die Aufnahme der Kobalt-Salze in den Anhang XIV der REACh-Verordnung nicht unterstützen. Im Falle einer Aufnahme der Stoffe Kobalt(II)-dinitrat, Kobalt-dichlorid, Kobalt(II)-sulfat, Kobalt(II)-diacetat, Kobalt(II)-carbonat in den Anhang XIV der REACh-Verordnung fordert die Coventya GmbH eine Ausnahmeregelung für die Verwendung von Kobaltsalzen in Lösungen zur Erzeugung von Konversionsschichten auf Zink- und Zinklegierungsschichten bei galvanischen Korrosionsschutzsystemen, eine Ausnahme von der Zulassungspflicht für die Verwendung von Kobaltsalzen (Cobalt(II)-sulphate, Cobalt(II)-dinitrate, Cobalt(II)-dichloride, Cobalt(II)-acetate und Cobalt(II)-carbonate) zum Zwecke der Erzeugung von kobalthaltigen metallischen Schichten bei der galvanischen Beschichtung und eine Ausnahmeregelung über die Verwendung für die Herstellung von Additiven/Präparaten für die Galvanotechnik. The use of Cobalt(II)-Sulphate, Cobalt(II)-Dinitrate, Cobalt(II)-Dichloride and Cobalt(II)-Acetate is essential for the manufacture of our products are relevant for the surface treatment. The remarks commenting on the ZVO (see Appendix) votes fully agree with the arguments and requirements of Coventya GmbH. On a collection is omitted here and we refer to the comments of the Central Association of Surface Treatment Professionals Germany (ZVO) "Application of divalent cobalt salts in Conversion layers in the European electroplating Industry" and "Application of divalent cobalt salts in cobalt and cobalt-alloy-layers in the European electroplating Industry". As described in the statements (see Appendix) Coventya GmbH cannot follow the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-

			chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations Coventya GmbH demand that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of anti-corrosion, decorative and bright Cobalt-Alloy-Plating, the use of Cobalt(II)-Salts for the purpose of functional, decorative and bright Cobalt- and Cobalt-Alloy-Plating and an exception on the use for the manufacture of additives / supplements for electroplating.
1537	2011/09/14 14:05	Company Poland	

1526	2011/09/14 13:00 File attached	Enthone GmbH Company United Kingdom	See attached
1474	2011/09/14 11:39 File attached Confidential	Company Italy	The major use of cobalt diacetate (70-80%) is as a catalyst for the manufacture of PTA, IPA and DMT; · Less than 500 tonnes/annum are used in this application; · These operations are carried out in chemical complexes under strictly controlled conditions; · This use does not give rise to high risk of worker exposure; · Prioritisation needs to be revisited: Cobalt diacetate is clearly NOT a high volume dispersive use substance as proposed in the Draft Background Document for Cobalt(II) Diacetate dated 15 June 2011 and limitation according to the methodology of use should be taken into account.

1455	2011/09/14 10:54 File attached	A.M.P.E.R.E. DEUTSCHLAND GmbH Company Germany	The electroplating and surface treatment industry is, at the same time, both a key technology and a cross technology and, as a result, a driving force for technological advancement. In the field of electroplating, cobalt salts are used in particular in the manufacture of coatings made of metallic cobalt-alloys. Within the overall field of electroplating, zinc and zinc alloys and their subsequent conversion layers for the cathodic corrosion protection of steel components represent also a particular area of focus which is of growing importance. Cobalt- and cobalt-alloy-plating is a field of special interest whose importance continues to grow from both an economic and technical point of view. The added value gained from refining surfaces contributes to a strengthening of Europe as an economic region and secures the competitive edge of European products on the world's markets. To save resources and reduce CO 2 one has to have durable products with optimised technical properties. Zinc and zinc alloy coatings with the conversion layers deposited on them make a considerable contribution to achieving these aims as a result of their corrosion-protection properties. It can be generally said that zinc & zinc alloys provide optimum corrosion protection for a minimum use of materials and at low costs. The need to save resources necessitates the ability to produce durable commodities which have optimised technical properties. As a result of their mechanical properties, e.g. high hardness levels in gold application, cobalt including coatings makes a crucial contribution to these aims. The use of cobalt (II) salts with its importance for the surface treatments industry, machine and plant engineering, automotive, improving the adhesion of paint layers when they are applied and other industrial sectors, such as the construction industry in Europe, must have a future in order to maintain the specific properties achieved with the application of electrochemical corrosion protection systems using zinc and zinc alloys with subsequent conversion layers. Further industries which are concerned are bathroom and furniture fittings, consumer articles, the watch and clockmaking and jewellery industries, medical technology and many other industrial fields in Europe will be referred to and the specific reasons explained as to why electrochemical cobalt- and cobalt-alloy-plating must remain an option in the future. Because of the following reasons we cannot follow the arguments to include the

			Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations.
1428	2011/09/14 09:51	Germany MemberState Germany	The German CA supports the ECHA proposal on prioritisation of cobalt(II) diacetate due to its carcinogenic properties and toxicity for reproduction, high volume and widespread uses. Supplementary Note: Conclusion, taking regulatory effectiveness considerations into account, page 7: We agree that all cobalt(II) compounds on the Candidate List should be treated equally with respect to prioritisation, because of the overall addition of divalent cobalt as the toxicologically relevant species from different cobalt(II) sources.
1358	2011/09/14 08:05 File attached Confidential	The Association of Lithuanian Chemical Industry Enterprises Industry or trade association Lithuania	Dear Madam/Sir, Herewith we respond during public consultation on inclusion of cobalt (II) acetate into Annex XIV of the Regulation 1907/2006, the list of substances to be authorized, and express our view. There is significant production of PET resin in Lithuania which uses terephthalic acid (PTA) as the raw material. Therefore all this chemical related information, including chemicals, like the catalyst cobalt (II) acetate, safety and accessibility is of great importance to our industry. As we agree with the classification of cobalt (II) diacetate which is identified as a substance

			of very high concern (SVHC) and it is classified as a carcinogen category 1B1, H350i (may cause cancer by inhalation), and as toxic for reproduction category 1B1, H360F (may damage fertility) we have concern over proposal to include this substance in Annex XIV. Since there is no production which uses cobalt (II) diacetate as catalyst in Lithuania there are no data on exposure at work place. The traces of metal bound in the subsequently manufactured PET resin are in a non soluble form. Resulting polymers are largely for food contact plastics use and therefore comply with the migration requirements of Regulation 2011/10/EU on plastic materials and articles intended to come into contact with food. There is significant discrepancy in high occupational exposure levels reported by Netherlands and Germany as having any relevance to the use of cobalt diacetate and manufacturers of PTA, IPA and DMT. This sector constitutes the major use of cobalt diacetate in the EU. The use of cobalt diacetate as a catalyst in the manufacture of PTA, IPA and DMT takes place at a small number of sites under strictly controlled conditions in the EU. This does not match the neither "high volume use" described in the draft recommendation nor wide dispersive use. As reported, all cobalt diacetate used as a catalyst in production of terephthalic acid, isophthalic acid and dimethylterephthalate is handled as a solution in acetic acid in the closed systems which removes the risks of inhalation associated with handling the crystallised salt. There is also no exposure for downstream users. The use of cobalt diacetate as catalyst of polymerization or dye for tinting PET resin is currently phased out as well. We suggest to take these arguments into account when making decision on inclusion cobalt (II) acetate into list of substances to be authorized. Concerns of the proposed prioritization are greatly overestimated and the available information is insufficient to make final decision.

1227	2011/09/14 01:01 File attached	CETS aisbl Industry or trade association Germany	The aim of this report is to focus upon the shortcomings of the Annex XV dossier for the substancees cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate. In particular, its intermediate use in plating industry. At the outset, cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate were part of the third priority list of existing substances under the legal framework of Regulation 793/93. The use of Cobalt(II) salts by the plating industry should be regarded as an intermediate in accordance with the definition of Article 3(15) of REACH. ECHA's interpretation of the concept of 'intermediate' (as given in its June 2010 clarification document) excludes substances used as surface treatments, e.g. Cobalt(II) salts used in metal finishing. However, the conclusion reached in the clarification document of June 2010 cannot be supported. The abovementioned clarification document was reviewed by two independent legal experts at the request of Industry. In Cefic's position paper of December 2010, the followed was reported: "Both legal advisory statements conclude that the interpretations for intermediates as elaborated in the [clarification] document go far beyond the Article 3 (15) of the REACH Regulation and therefore the concept of intermediates was narrowed tremendously by ECHA, Commission and the Member States." That position was subsequently endorsed by Cefic itself (see December 2010 document) and supported in a number of recent petitions made by Industry associations, such as AIAS and the Institute of Metal Finishing. In this connection, it is worthwhile noting at the outset that ECHA's guidance document for the preparation of an Annex XV dossier on the identification of substances of very high concern states in its point 3.3.4 that, "certain types of information, including exposure-related information, are needed for the later process used to prioritize the substances for inclusion on Annex XIV, once the dossier has been accepted." The guidance then continues to make reference to 'available' information on exposures. 1. Occupational safety a. No risk in application of Cobalt(II) salts for the end-consumer or industrial client since only pure Cobalt metal is deposited on the substrate and there is no Cobalt(II) salt on top of the plated parts. b. Safe handling of the solutions to minimize the risk for the co-workers for dermal or respiratory tract absorption (as evidenced by of regular medical visits and vaccination of the co-workers involved). 2. Alternative processes There are a variety of familiar alternatives for Cobalt plating. These alternatives do not

			include one universal substitute process, capable of replacing Cobalt plating on a one to one basis (For details see attachment). 3. Overall implications: a. The application of Cobalt plating shows a high socio-economic benefits due to the functional properties in a wide range of products (For details see attached document). 4. Summarized comments: Metallic layers with a cobalt or cobalt alloy surface are well established and widely used in the market place. The tendency in the electronic industry and other industrial sectors continues to emphasise the look and technical advantages cobalt or cobalt alloys while taking into account the existing quality standards. Long-term studies of the alternatives demonstrate the irreplaceability of cobalt or cobalt alloy surfaces made using electrolytes containing cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate for most applications. The finish color, corrosion protection and solderability offered by layers made using cobalt or cobalt alloy electrolytes is noticeably poorer, which has a negative effect on the lifetime of the products to which the process is applied. This necessitates increased use of raw materials which is contrary to achieving sustainability targets set by European programmes. 5. Resulting requirements: 1. According to the available data there is no basis for an inclusion of the Cobalt(II) salts in Annex XIV of the REACh regulation. 2. In the case of an inclusion it is absolutely necessary to realize a derogation rule for the application of Cobalt plating.

1209	2011/09/13 21:26 File attached	 Company United Kingdom	Application of divalent cobalt salts in Conversion layers in the European electroplating Industry Within the overall field of electroplating, zinc and zinc alloys and their subsequent conversion layers for the cathodic corrosion protection of steel components represent a particular area of focus which is of growing importance. The use of cobalt (II) salts with its importance for the surface treatments industry, machine and plant engineering, automotive, improving the adhesion of paint layers when they are applied and other industrial sectors, such as the construction industry in Europe, must have a future in order to maintain the specific properties achieved with the application of electrochemical corrosion protection systems using zinc and zinc alloys with subsequent conversion layers. With effect from 1 July 2007, only trivalent conversion coatings were permitted to be used for the aftertreatment of galvanized / zinc alloy coated components for new registrations of standard cars. Cr(III) based conversion coatings with high levels of corrosion protection are only possible if cobalt salts are added to the application solutions and cobalt is included in the conversion coatings as a hydroxide (damp) and oxide (dry) in proportions of < 2% with reference to the conversion layer. The addition of cobalt salts is necessary in particular if corrosion protection is required in warm or hot environments (e.g. engine spaces, brakes, gearboxes etc. and in electrical parts in housings etc.). In these cases, solutions containing cobalt are state-of-the-art and indispensable up to now for zinc layers, zinc nickel and zinc iron alloys. Conclusions Cathodic corrosion protection using zinc and zinc alloys is an indispensable characteristic of coated steel components as used in all fields of industry, the trades and in households, and this protection is reinforced and maintained by conversion layers. Electrochemical anti-corrosion coatings extend the lifetime of steel parts by a factor of 20 – 100 and, as a result, make a valuable contribution to enabling resource-saving industrial and economic processes. There is little practical research available on the application of cobalt-free conversion coatings. In this context, comprehensive testing by electroplating firms is needed; optimisation and adjustment of applications need to be developed. In addition to this, it is necessary for end users to carry out function testing and day-to-day testing to determine and secure the properties of the coatings in realistic conditions. In many contexts, there are also safety aspects to be taken into consideration. On the market you cannot find cobalt

			free conversion coatings with anything approaching the results from those which include cobalt. Prohibiting the use of cobalt salts in conversion coatings would considerably reduce the corrosion protection of the parts so coated and that would have negative effects on the durability and sustainability of industrial efforts in Europe. The result would be increased consumption of resources and energy and this, in turn, would jeopardise the European targets for climate protection and efforts to reduce CO2 emissions. European manufacturers requiring the higher performance offered by cobalt conversion layers would simply arrange for coated articles to be imported from elsewhere thereby further jeopardising the already struggling surface treatment industry within the EU. MacDermid Scandinavia cannot therefore accept the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations we request that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of creating conversion coatings in the fields of anti-corrosion zinc and zinc-alloy plating.
1201	2011/09/13 20:24 File attached	European Biogas Association International NGO Czech Republic	

1188	2011/09/13 19:52 File attached	Verband der Automobilindustrie VDA Industry or trade association Germany	• It is difficult to see why the current justification and proportionality of the relevant provisions to handle Cobalt (II) diacetate should need further approvals. National and European law already requires aspects of regulatory monitoring and control as well as to the increasing internationalization of requirements. Any additional configurable prioritization and approval of changes will only reproduce the current national requirements see Annex
1185	2011/09/13 19:45 File attached	DALIC Company France	The use of cobalt sulphate in wet surface treatment doesn't meet the criteria of prioritization: - Very low exposition for closed processes like DALISTICK and for BRUSH Plating under controlled conditions, - Very low quantity of solutions used with these processes, - Very occasionally/ few employee exposed, - No consumer exposure with the dangerous substance, - Environnemental exposition controlled by regulations.

1167	2011/09/13 19:09 File attached	Company United Kingdom	Application of divalent cobalt salts in Conversion layers in the European electroplating Industry Within the overall field of electroplating, zinc and zinc alloys and their subsequent conversion layers for the cathodic corrosion protection of steel components represent a particular area of focus which is of growing importance. The use of cobalt (II) salts with its importance for the surface treatments industry, machine and plant engineering, automotive, improving the adhesion of paint layers when they are applied and other industrial sectors, such as the construction industry in Europe, must have a future in order to maintain the specific properties achieved with the application of electrochemical corrosion protection systems using zinc and zinc alloys with subsequent conversion layers. With effect from 1 July 2007, only trivalent conversion coatings were permitted to be used for the aftertreatment of galvanized / zinc alloy coated components for new registrations of standard cars. Cr(III) based conversion coatings with high levels of corrosion protection are only possible if cobalt salts are added to the application solutions and cobalt is included in the conversion coatings as a hydroxide (damp) and oxide (dry) in proportions of < 2% with reference to the conversion layer. The addition of cobalt salts is necessary in particular if corrosion protection is required in warm or hot environments (e.g. engine spaces, brakes, gearboxes etc. and in electrical parts in housings etc.). In these cases, solutions containing cobalt are state-of-the-art and indispensable up to now for zinc layers, zinc nickel and zinc iron alloys. Conclusions Cathodic corrosion protection using zinc and zinc alloys is an indispensable characteristic of coated steel components as used in all fields of industry, the trades and in households, and this protection is reinforced and maintained by conversion layers. Electrochemical anti-corrosion coatings extend the lifetime of steel parts by a factor of 20 – 100 and, as a result, make a valuable contribution to enabling resource-saving industrial and economic processes. There is little practical research available on the application of cobalt-free conversion coatings. In this context, comprehensive testing by electroplating firms is needed; optimisation and adjustment of applications need to be developed. In addition to this, it is necessary for end users to carry out function testing and day-to-day testing to determine and secure the properties of the coatings in realistic conditions. In many contexts, there are also safety aspects to be taken into consideration. On the market you cannot find cobalt

			free conversion coatings with anything approaching the results from those which include cobalt. Prohibiting the use of cobalt salts in conversion coatings would considerably reduce the corrosion protection of the parts so coated and that would have negative effects on the durability and sustainability of industrial efforts in Europe. The result would be increased consumption of resources and energy and this, in turn, would jeopardise the European targets for climate protection and efforts to reduce CO2 emissions. European manufacturers requiring the higher performance offered by cobalt conversion layers would simply arrange for coated articles to be imported from elsewhere thereby further jeopardising the already struggling surface treatment industry within the EU. MacDermid Espanola S.A. cannot therefore accept the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations we request that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of creating conversion coatings in the fields of anti-corrosion zinc and zinc-alloy plating.
1160	2011/09/13 18:56 File attached	Company United Kingdom	Application of divalent cobalt salts in Conversion layers in the European electroplating Industry Within the overall field of electroplating, zinc and zinc alloys and their subsequent conversion layers for the cathodic corrosion protection of steel components represent a particular area of focus which is of growing importance. The use of cobalt (II) salts with its importance for the surface treatments industry, machine and plant engineering, automotive, improving the adhesion of paint layers when they are applied and other industrial sectors, such as the construction industry in Europe, must have a future in order to maintain the specific properties achieved with the application of electrochemical corrosion protection systems using zinc and zinc alloys with subsequent conversion layers. With effect from 1 July 2007, only trivalent conversion coatings were permitted to be used for the aftertreatment of galvanized / zinc alloy coated components for new registrations of standard cars. Cr(III) based conversion coatings with high levels of corrosion protection are only possible if cobalt salts are added to the application solutions and cobalt is included in the conversion

			coatings as a hydroxide (damp) and oxide (dry) in proportions of < 2% with reference to the conversion layer. The addition of cobalt salts is necessary in particular if corrosion protection is required in warm or hot environments (e.g. engine spaces, brakes, gearboxes etc. and in electrical parts in housings etc.). In these cases, solutions containing cobalt are state-of-the-art and indispensable up to now for zinc layers, zinc nickel and zinc iron alloys. Conclusions Cathodic corrosion protection using zinc and zinc alloys is an indispensable characteristic of coated steel components as used in all fields of industry, the trades and in households, and this protection is reinforced and maintained by conversion layers. Electrochemical anti-corrosion coatings extend the lifetime of steel parts by a factor of 20 – 100 and, as a result, make a valuable contribution to enabling resource-saving industrial and economic processes. There is little practical research available on the application of cobalt-free conversion coatings. In this context, comprehensive testing by electroplating firms is needed; optimisation and adjustment of applications need to be developed. In addition to this, it is necessary for end users to carry out function testing and day-to-day testing to determine and secure the properties of the coatings in realistic conditions. In many contexts, there are also safety aspects to be taken into consideration. On the market you cannot find cobalt free conversion coatings with anything approaching the results from those which include cobalt. Prohibiting the use of cobalt salts in conversion coatings would considerably reduce the corrosion protection of the parts so coated and that would have negative effects on the durability and sustainability of industrial efforts in Europe. The result would be increased consumption of resources and energy and this, in turn, would jeopardise the European targets for climate protection and efforts to reduce CO2 emissions. European manufacturers requiring the higher performance offered by cobalt conversion layers would simply arrange for coated articles to be imported from elsewhere thereby further jeopardising the already struggling surface treatment industry within the EU. MacDermid GmbH cannot therefore accept the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations we request that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of creating conversion coatings in the fields of anti-corrosion zinc and

			zinc-alloy plating.
1147	2011/09/13 18:38 File attached	Company United Kingdom	Application of divalent cobalt salts in Conversion layers in the European electroplating Industry Within the overall field of electroplating, zinc and zinc alloys and their subsequent conversion layers for the cathodic corrosion protection of steel components represent a particular area of focus which is of growing importance. The use of cobalt (II) salts with its importance for the surface treatments industry, machine and plant engineering, automotive, improving the adhesion of paint layers when they are applied and other industrial sectors, such as the construction industry in Europe, must have a future in order to maintain the specific properties achieved with the application of electrochemical corrosion protection systems using zinc and zinc alloys with subsequent conversion layers. With effect from 1 July 2007, only trivalent conversion coatings were permitted to be used for the aftertreatment of galvanized / zinc alloy coated components for new registrations of standard cars. Cr(III) based conversion coatings with high levels of corrosion protection are only possible if cobalt salts are added to the application solutions and cobalt is included in the conversion coatings as a hydroxide (damp) and oxide (dry) in proportions of < 2% with reference to the conversion layer. The addition of cobalt salts is necessary in particular if corrosion protection is required in warm or hot environments (e.g. engine spaces, brakes, gearboxes etc. and in electrical parts in housings etc.). In these cases, solutions containing cobalt are state-of-the-art and indispensable up to now for zinc layers, zinc nickel and zinc iron alloys. Conclusions Cathodic corrosion protection using zinc and zinc alloys is an indispensable characteristic of coated steel components as used in all fields of industry, the trades and in households, and this protection is reinforced and maintained by conversion layers. Electrochemical anti-corrosion coatings extend the lifetime of steel parts by a factor of 20 – 100 and, as a result, make a valuable contribution to enabling resource-saving industrial and economic processes. There is little practical research available on the application of cobalt-free conversion coatings. In this context, comprehensive testing by electroplating firms is needed; optimisation and adjustment of applications need to be developed. In addition to this, it is

			necessary for end users to carry out function testing and day-to-day testing to determine and secure the properties of the coatings in realistic conditions. In many contexts, there are also safety aspects to be taken into consideration. On the market you cannot find cobalt free conversion coatings with anything approaching the results from those which include cobalt. Prohibiting the use of cobalt salts in conversion coatings would considerably reduce the corrosion protection of the parts so coated and that would have negative effects on the durability and sustainability of industrial efforts in Europe. The result would be increased consumption of resources and energy and this, in turn, would jeopardise the European targets for climate protection and efforts to reduce CO2 emissions. European manufacturers requiring the higher performance offered by cobalt conversion layers would simply arrange for coated articles to be imported from elsewhere thereby further jeopardising the already struggling surface treatment industry within the EU. MacDermid France cannot therefore accept the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations we request that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of creating conversion coatings in the fields of anti-corrosion zinc and zinc-alloy plating.

1136	2011/09/13 18:27 File attached	 Company United Kingdom	Application of divalent cobalt salts in Conversion layers in the European electroplating Industry Within the overall field of electroplating, zinc and zinc alloys and their subsequent conversion layers for the cathodic corrosion protection of steel components represent a particular area of focus which is of growing importance. The use of cobalt (II) salts with its importance for the surface treatments industry, machine and plant engineering, automotive, improving the adhesion of paint layers when they are applied and other industrial sectors, such as the construction industry in Europe, must have a future in order to maintain the specific properties achieved with the application of electrochemical corrosion protection systems using zinc and zinc alloys with subsequent conversion layers. With effect from 1 July 2007, only trivalent conversion coatings were permitted to be used for the aftertreatment of galvanized / zinc alloy coated components for new registrations of standard cars. Cr(III) based conversion coatings with high levels of corrosion protection are only possible if cobalt salts are added to the application solutions and cobalt is included in the conversion coatings as a hydroxide (damp) and oxide (dry) in proportions of < 2% with reference to the conversion layer. The addition of cobalt salts is necessary in particular if corrosion protection is required in warm or hot environments (e.g. engine spaces, brakes, gearboxes etc. and in electrical parts in housings etc.). In these cases, solutions containing cobalt are state-of-the-art and indispensable up to now for zinc layers, zinc nickel and zinc iron alloys. Conclusions Cathodic corrosion protection using zinc and zinc alloys is an indispensable characteristic of coated steel components as used in all fields of industry, the trades and in households, and this protection is reinforced and maintained by conversion layers. Electrochemical anti-corrosion coatings extend the lifetime of steel parts by a factor of 20 – 100 and, as a result, make a valuable contribution to enabling resource-saving industrial and economic processes. There is little practical research available on the application of cobalt-free conversion coatings. In this context, comprehensive testing by electroplating firms is needed; optimisation and adjustment of applications need to be developed. In addition to this, it is necessary for end users to carry out function testing and day-to-day testing to determine and secure the properties of the coatings in realistic conditions. In many contexts, there are also safety aspects to be taken into consideration. On the market you cannot find cobalt

			free conversion coatings with anything approaching the results from those which include cobalt. Prohibiting the use of cobalt salts in conversion coatings would considerably reduce the corrosion protection of the parts so coated and that would have negative effects on the durability and sustainability of industrial efforts in Europe. The result would be increased consumption of resources and energy and this, in turn, would jeopardise the European targets for climate protection and efforts to reduce CO2 emissions. European manufacturers requiring the higher performance offered by cobalt conversion layers would simply arrange for coated articles to be imported from elsewhere thereby further jeopardising the already struggling surface treatment industry within the EU. MacDermid Italiana cannot therefore accept the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations we request that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of creating conversion coatings in the fields of anti-corrosion zinc and zinc-alloy plating.
1120	2011/09/13 18:10	Atotech Deutschland GmbH Company Germany	This Comment is provided on behalf of the following organizations: ☐ Atotech Deutschland GmbH ☐ Atotech Österreich GmbH ☐ Atotech CZ, a.s. , Česká Republika ☐ Atotech SK, s.r.o., Slovenská Republika ☐ Atotech France ☐ Atotech Italia S.r.l. ☐ OOO Atotech-Chemeta, Lithuania ☐ Atotech Nederland B.V. ☐ Atotech Poland ☐ Atotech España S.A ☐ Atotech Skandinavien AB ☐ Atotech Slovenija, proizvodnja kemicnih izdelkov, d.d. ☐ Atotech UK Ltd. Comment on the applied approach of prioritization Article 58 paragraph 3 of the REACH regulation defines 3 criteria for the substances to be

			prioritized for inclusion in Annex XIV: (a) PBT or vPvB properties or (b) Wide dispersive use or (c) High volumes. To (a) None of the proposed Cobalt salts has PBT or vPvB properties. ECHA uses a scoring system for the determination of substances for prioritization of SVHC for inclusion in the List of Substances Subject for Authorization taking into account the aforementioned 3 criteria. The weighting of the single scoring results is as follows: - PBT or vPvB properties: 18% - Wide dispersive use: 41% - Volumes: 41%. There is no justification for this weighting based on the REACH regulation. Following ECHA's explanation for the weighting, the substances on the Candidate List are a defined as a selection of substances with very severe hazard properties. However the European Commission chose to highlight PBT and vPvB properties over e.g. CMR properties in the REACH regulation (e.g. Art. 58, para. 3) as risks of first mentioned substances are deemed to be higher. Keeping this in mind the weighting should be equal throughout the 3 criteria as otherwise the hazard (PBT and vPvB) properties would be underestimated against the volume and the wide dispersive use. To (b) The term 'wide-dispersive use' is explained in Chapter R.16.2.1.6 of the Guidance on Information Requirements and Chemical Safety Assessment as follows: 'Wide-dispersive use refers to many small point sources or diffuse release by for instance the public at large or sources like traffic. … Wide-dispersive use can relate to both indoor and outdoor use'. In the Technical Guidance Document for Risk Assessment of new and existing substances and biocides (2003, Chapter 5) this term is defined as follows: 'Wide-dispersive use refers to activities which deliver uncontrolled exposure. Examples relevant for occupational exposure: Painting with paints; spraying of pesticides. Examples relevant for environmental/consumer exposure: Use of detergents, cosmetics, disinfectants, household paints.' In addition, the ECETOC Report No. 93 on Targeted Risk Assessment (Appendix B) states: 'A substance marketed for wide-dispersive use is likely to reach consumers, and it can be assumed that such a substance will be emitted into the environment for 100% during or after use.'

			Definitions above do clearly not apply for the use of cobalt containing solutions in industrial application. Such applications are strictly controlled equipment-technology-wise, personnel-training-wise, safety-wise and personnel-safety wise respectively. Furthermore strict requirements apply for waste water and exhaust air cleaning technology. Consequently the use is absolutely not comparable with "sources like traffic", "painting with uncontrolled exposure" or (outdoor) "spraying of pesticides". In contrary to the definition of ECETOC Report No. 93 the substance never reach consumers and exposure to environment is minimal as a result of aforementioned measures. ECHA disregards the given definitions of wide dispersive use and postulates that this criterion can be regarded as directly driven by the number of sites. ECHA defines already a number of 100 sites in Europe where cobalt salts are used as "high" (maximum scoring = 3). The "Guidance on Information Requirements and Chemical Safety Assessment" gives traffic as an example for "many small point sources" with 240 million point sources in total. For the scoring the "number of sites" is multiplied by "Release". Here an inconsistency is present in the evaluation of the use of cobalt(II)sulphate in industrial surface treatment: • It is noted that the number of sites of use is unknown, however rated as "high". • It is stated that "Releases and exposure to workers might be controlled in most instances, however some of the uses appear to have a potential for significant worker exposure". Consequently the majority of uses is controlled and should be rated accordingly (score '1'). Assuming that few cases have a potential for high exposure does not justify the classification as "wide-dispersive use", which would base on a high number of point sources with uncontrolled exposure. In addition the approach of ECHA disregards the fact that the number if sites is not relevant for exposure of workers but the number of workers in contact with the concerned substance. For surface treatment application in industrial settings the number of persons working near the process solutions is very low. It can be estimated by 1-2 persons per site for automated systems and 4-5 persons per site for non-automated systems. Regulatory effectiveness ECHA extends the scoring approach with a verbal-argumentative evaluation. This shall facilitate the determination of the regulatory effectiveness of the authorization process. Considering that there are no existing alternatives for different uses of cobalt salts there will be no environmental or human health benefit as an authorization has to be granted for this specific technology. But this process will result in considerable costs and workload for the companies affected, resulting in downsides competition-wise on global level as other

			economies will simply continue using the substance without any bureaucratic hurdles. It should be the aim of European authorities that existing technology and operational conditions are optimized there where the exposition elevated. Please note here that this is only the case for some exceptions. Regulatory effectiveness would be much higher if consistent exposure and emission standards are agreed throughout Europe and forcefully controlled by member states authorities. Conclusion It is to note that cobalt salts in surface treatment applications do neither fulfill the criteria "PBT or vPvB properties" nor "wide-dispersive use" and regulatory effectiveness is also not present for this case. Consequently neither facts nor the formal process justify a prioritization of cobalt salts for REACH Annex XIV.
1109	2011/09/13 18:01 File attached	Central Association of Surface Treatment Professionals Germany (ZVO) Industry or trade association Germany	The Central Association of Surface Treatment Professionals Germany (ZVO) herewith comments Application of divalent cobalt salts in cobalt or cobalt alloy layers in the European electroplating Industry: In the following the summarizing arguments and comments will be presented. For the detailed statements we do refer to the uploaded document. The comments are also valid for the other Cobalt Compounds. ---------- Cobalt (II) Sulphate, Cobalt (II) Dinitrate, Cobalt (II) Dichloride, Cobalt (II) Acetate and Cobalt (II) Carbonate a. Electrohemical processes for generating Cobalt and/or Cobalt-Alloy layers based on Cobalt compounds - These processes involve immersing the components to be coated in an aqueous cobalt salt solution. Metallic cobalt is deposited by the process of electrochemical reduction as metal themselves or in cobalt-alloys. - Cobalt and cobalt-alloy plating is considered to be the most desirable final finish for a majority of electroplated consumer goods and electronic equipment. Other surfaces cannot provide the same levels of quality and economy - The addition of cobalt-salts is necessary in particular if hardness is required in Gold alloy depsosits. - The result of this coating process is that the final surface of the component contains

			only metallic cobalt, which is a completely harmless substance from a consumer viewpoint. b. Potential health hazards - There are no figures available for absorption of soluble cobalt salts through the skin, but a sensitising effect on the skin is believed to exist. - No figures on acute inhalation toxicity of soluble cobalt compounds are available. However, two-year tests on rats indicate that there may be a hazard of chronic toxicity including damage to the respiratory tract. - Health hazards through unintentional oral intake of soluble cobalt salts do not exist. Wherever cobalt salts or compounds containing cobalt salts are handled, there are strict prohibitions in force to prevent eating, drinking and smoking. Unintentional intake can, therefore, be discounted. - Sensitisation of the skin can also be excluded. Sufficient protection exists by applying personal protective equipment (PPE). Employers are required to monitor the compliance of staff with the prescribed use of PPE. - If existing safety regulations are not adhered to, there are potential health hazards in handling cobalt (II) salts in day-to-day production environments, which is why workers must be subjected to regular health checks in order to detect any possible health damage at an early stage. It is important to note that, in coatings firms, only fluid mixtures are used for generating cobalt gold alloy layers. - Preventative health checks are required for workers who may be at risk from inhalation of cobalt compounds in the shape of respirable dust or aerosols or who may have skin contact. - To protect its workers, companies are required to take suitable measurements in the workplace to determine the extent of any effects of cobalt compounds and, in this way, to monitor the long-term effectiveness of the protective measures implemented – e.g. the efficiency of air extractors. - The employer is required to commission an approved doctor to carry out the preventative examinations. The requirement for an "approved" doctor is to ensure that he/she has the necessary technical knowledge, understands the technical equipment and work environment and is able to implement the regulations as required. c. Environmental protection when dealing with conversion layers - Solutions containing cobalt for generating cobalt or cobalt alloy layers require electricity. The application usually takes place at temperatures between 25 and 40°C. Where appropriate technical equipment has been installed on site, such as an air extractor, this manufacturing process does not generate any hazardous aerosols and the air in the workplace will not be contaminated in fact,

			- Cobalt is found in aqueous solutions as a cation. By adjusting the pH value to the alkaline range, the cobalt can be precipitated out as cobalt hydroxide at < 1 mg/L. There is currently no limit value in the German Waste Water Regulations for electroplating firms or in Appendix 40 to the regulations. d. Economic importance of electrochemical cobalt plating Cobalt and cobalt-alloy plating is considered to be the most desirable final finish for a majority of electroplated consumer goods and electronic equipment. Other surfaces cannot provide the same levels of quality and economy. The economic advantage is in the attractive appearance of the surface and the high degree of hardness in different alloys, chemical resistance and toxicological harmlessness, achieved with very little effort. Products plated in this way can be expected to have a long service lifetime. To cite just one example, consider the decorative cobalt-tin or cobalt-gold alloy plating of taps and fittings in sanitary installations. Even where they are subjected to tough professional use and cleaned with abrasive cleaners, these cobalt included surfaces will provide decades of protection on high-grade taps and similar parts. The technical and decorative cobalt alloy surface is thus a contribution to careful use of natural resources. e. Resulting Requirments > As described in the statements above the Central Association of Surface Treatment Professionals Germany (ZVO) cannot follow the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. > In the event that these substances are included in Appendix XIV of the REACH regulations we demand that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of anti-corrosion, decorative and bright Cobalt-Alloy-Plating.

1101	2011/09/13 17:56 File attached	Company United Kingdom	Application of divalent cobalt salts in Conversion layers in the European electroplating Industry Within the overall field of electroplating, zinc and zinc alloys and their subsequent conversion layers for the cathodic corrosion protection of steel components represent a particular area of focus which is of growing importance. The use of cobalt (II) salts with its importance for the surface treatments industry, machine and plant engineering, automotive, improving the adhesion of paint layers when they are applied and other industrial sectors, such as the construction industry in Europe, must have a future in order to maintain the specific properties achieved with the application of electrochemical corrosion protection systems using zinc and zinc alloys with subsequent conversion layers. With effect from 1 July 2007, only trivalent conversion coatings were permitted to be used for the aftertreatment of galvanized / zinc alloy coated components for new registrations of standard cars. Cr(III) based conversion coatings with high levels of corrosion protection are only possible if cobalt salts are added to the application solutions and cobalt is included in the conversion coatings as a hydroxide (damp) and oxide (dry) in proportions of < 2% with reference to the conversion layer. The addition of cobalt salts is necessary in particular if corrosion protection is required in warm or hot environments (e.g. engine spaces, brakes, gearboxes etc. and in electrical parts in housings etc.). In these cases, solutions containing cobalt are state-of-the-art and indispensable up to now for zinc layers, zinc nickel and zinc iron alloys. Conclusions Cathodic corrosion protection using zinc and zinc alloys is an indispensable characteristic of coated steel components as used in all fields of industry, the trades and in households, and this protection is reinforced and maintained by conversion layers. Electrochemical anti-corrosion coatings extend the lifetime of steel parts by a factor of 20 – 100 and, as a result, make a valuable contribution to enabling resource-saving industrial and economic processes. There is little practical research available on the application of cobalt-free conversion coatings. In this context, comprehensive testing by electroplating firms is needed; optimisation and adjustment of applications need to be developed. In addition to this, it is necessary for end users to carry out function testing and day-to-day testing to determine and secure the properties of the coatings in realistic conditions. In many contexts, there are also safety aspects to be taken into consideration. On the market you cannot find cobalt

			free conversion coatings with anything approaching the results from those which include cobalt. Prohibiting the use of cobalt salts in conversion coatings would considerably reduce the corrosion protection of the parts so coated and that would have negative effects on the durability and sustainability of industrial efforts in Europe. The result would be increased consumption of resources and energy and this, in turn, would jeopardise the European targets for climate protection and efforts to reduce CO2 emissions. European manufacturers requiring the higher performance offered by cobalt conversion layers would simply arrange for coated articles to be imported from elsewhere thereby further jeopardising the already struggling surface treatment industry within the EU. MacDermid plc cannot therefore accept the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations we request that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of creating conversion coatings in the fields of anti-corrosion zinc and zinc-alloy plating.
1055	2011/09/13 16:55	Agoria Industry or trade association Belgium	The prioritization of the different cobalt salts does not seem appropriate for Agoria. The classification makes these substances surely eligible to be prioritized but there are serious doubts on the claimed widespread use of cobalt dichloride as well as on the lack of clear exposure which has an impact on the prioritization. Agoria does not believe that these cobalt salts should be prioritized at this stage. The reported quantity for the different cobalt salts in the Annex XV dossier, are not reflecting the actual reality within the EU. In global the actual use is significantly less than the volume mentioned in the Annex XIV files. On top of this between 90 to 99% of the use is an intermediate use which is exempted from the authorization procedure. (cobalt sulphate >97%, cobalt diacetate > 90%, cobalt carbonate > 94%, cobalt dinitrate > 99% and cobalt dichloride > 99%) This means that the volume of cobalt dichloride in the scope of the authorization procedure is negligible according to our estimations. The exposure to cobalt salts is furthermore well controlled as is documented by the Chemical Safety report submitted for the REACH registration for these cobalt salts. The CSR includes an exposure scenario for each identified and reported use and each of these exposure scenario resulted in a risk characterization ratio below 1. This means that all

			identified uses of cobalt salts within the EU are well controlled. Cobalt salts are also already controlled by different existing legislations to protect human health as well as the environment. The carcinogen at work directive (2004/37/EC) imposes the need for a risk management at the work place including the taking of the necessary risk management options. Also the IPPC directive (2008/1/EC) is providing the framework for limiting the impact on the environment. The general restriction of the supply of CMR's for supply to the general public is also limiting the consumer exposure. (REACH) On the potential substitution there is a general misconception regarding interchangeability. Cobalt salts cannot be substituted by other cobalt salts in most of the applications. In nearly all cases this is neither technical nor economically feasible to implement such a substitution. In this respect we are not supporting at all the grouping of all cobalt salts to be prioritized which is according to our information done out of 'fear' of this NON-existing potential for substitution. The socio-economic impact of the authorization is clearly underestimated according to Agoria. First of all, we are confused of the diverging signals given, taken into account that cobalt was identified as a critical raw material within the Raw Materials Initiative of the European Commission linked to the economic importance in different future technologies such as batteries, combating air pollution. In this report the substitution potential is described as: "Substitutes for cobalt are constantly being sought mainly because of the metal price volatility. However, due to the unique properties of cobalt, there are limited options for substitution and almost all substitutes result in reduced product performance." This seems a conflicting signal with this proposal to prioritize cobalt salts for authorization and thus affecting even further the long term availability for cobalt salts. The different cobalt salts are used in a broad range of applications the following sectors: - The use as catalysts in the oil refining, synthetic fibres, plastics, desulphurised fuels, oxidation catalyst for the car industry, esterfication, - Hardmetals - Rechargeable batteries for industrial applications, hybrid cars, computers, power tools, phones, - Electroplating such as anodizing, wear resistance, electronics, corrosion resistance, - Other applications such as animal feed, ceramics, tyres, inks/dyes, paint driers, pigments, biotechnology. Several of these applications, in which cobalt salts are used, in general as an intermediate, contribute strongly to the evolution to a more sustainable society. Finding alternatives is not that easy given the broad applications, the technical and economic challenges linked to

			substitution. The cobalt salts are not found in the final product given that it is mostly used as an indispensable intermediate within the value chain. This means also that exposure to the end-consumer can be exempted.
1039	2011/09/13 16:40	Company Portugal	As a member of CPME (Committe of PET Manufacturers in Europe) we agree with their comments

988	2011/09/13 14:56 File attached	Company Germany	Our company cannot follow the arguments to assume the cobalt-salts into the appendix XIV of the REACH regulations. According to this, we agree with the former statement of the Central Association of Surface Treatment Professionals Germany (ZVO). Link : http://www.zvo.org/uploads/media/Kommentierung_ZVO_Cobaltsalze_galvanisch_V20110911_ENGLISCH.pdf Another aspect is the global market. The ban of cobalt-salts would weaken the euroean industry, especially the export-oriented mechanical engineering. After the real-estate crisis 2007-2010 and the Euro-crisis, started in 2011, another self-made mechanical-engineering-crisis would damage Europe. As small company of craftsmanship, we estimate, that our company is going to loose up to 50% of the workplaces if cobalt-salts were assumed into the appendix XIV of the REACH regulations.
984	2011/09/13 14:52 File attached	Industry or trade association Germany	Cathodic corrosion protection using zinc and zinc alloys is an indispensable characteristic of coated steel components as used in all fields of industry, the trades and in households, and this protection is reinforced and maintained by conversion layers. Electrochemical anti-corrosion coatings extend the lifetime of steel parts by a factor of 20 – 100 and, as a result, make a valuable contribution to enabling resource-saving industrial and economic processes. There is little practical research available on the application of cobalt-free conversion coatings. In this context, comprehensive testing by electroplating firms is needed; optimisation and adjustment of applications need to be developed. In addition to this, it is necessary for end users to carry out function testing and day-to-day testing to determine and secure the properties of the coatings in realistic conditions. In many contexts, there are also safety aspects to be taken into consideration. On the market you cannot find cobalt free conversion coatings with nearly the same results than including cobalt. Prohibiting the use of cobalt salts in conversion coatings would considerably reduce the corrosion protection of the parts so coated and that would have negative effects on the durability and sustainability of industrial efforts in Europe. The result would be increased consumption of resources and energy and this, in turn, would jeopardise the European targets for climate protection and efforts to reduce CO2 emissions. As described in the attached statements above the German Fasteners Association (DSV) cannot follow the arguments to include the Cobalt Salts (cobalt(II)-sulphate, cobalt(II)-

			nitrate, cobalt(II)-chloride and cobalt(II)-acetate) into the Appendix XIV of the REACH regulations. In the event that these substances are included in Appendix XIV of the REACH regulations we demand that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of anti-corrosion, decorative and bright Cobalt-Alloy- Plating. Attached documents we would like to refer to: Central Association of Surface Treatment Professionals Germany (ZVO) "Application of divalent cobalt salts in Conversion layers in the European electroplating Industry"
974	2011/09/13 14:40	Sweden MemberState Sweden	We support the prioritisation of cobalt diacetate for inclusion in Annex XIV. The substance has high priority due to high volume and wide dispersive use.

960	2011/09/13 14:24	United Kingdom MemberState United Kingdom	Based on the prioritisation criteria and the possibility of significant workplace exposure we agree with the proposal to recommend the following substances for inclusion in Annex XIV. Cobalt (II) Sulphate Cobalt (II) diacetate However, whilst we agree that grouping certain compounds, such as transition metal salts, together is a sensible approach, there should be evidence to support their interchangability. In the case of the following cobalt compounds we are not sure that this is the case and this warrants further investigation before these substances, which only score moderately according to the prioritisation criteria, are recommended for inclusion in Annex XIV. Cobalt (II) dinitrate Cobalt (II) Carbonate Cobalt dichloride
959	2011/09/13 14:23	Reactana Katalysatoren und Chemikalien GmbH Company Germany	In addition to the comments we made yesterday on this website, we further wish to particularly stipulate the following matters: • Reactana GmbH is in agreement with the comments made by the Cobalt Reach Consortium, which we are a member of , as well as with the comments made by the downstream users body CPME. • The Cobalt Diacetate that is exclusively produced by us in form of aqueous solutions is both manufactured and transported under strictly controlled conditions with no worker exposure or environmental release. • With regard to information provided in our comments of yesterday and today, we think that the prioritisation for cobalt acetate is greatly overstated in the ECHA proposal and this should be abolished. • Since we as manufacturer and our customers as downstream users are handling this material under strictly controlled conditions, it is totally inappropriate to included this substance in the authorisation process of REACH. Biebesheim am Rhein, 13.9.2011

927	2011/09/13 13:12 Company Germany	Dr. Kubitz GmbH	Cobalt sulfate solutions with additions of phosphorus are being used as electrolyte for the deposition of cobalt phosphorus coatings. These serve after coding as scale in automatic angular or distance measuring e.g. in the machine tool industry. Their advantage over all competing systems is robustness against dirt and adverse environmental conditions and their modest requirements for space. They are contained in some of the products of at least one of the largest ball bearing manufacturers (who however might not be aware of this fact)
916	2011/09/13 12:36 File attached Confidential	 Company Germany	General comment summarizing our point of view: Based on the use and exposure information, the use of aqueous Cobalt(II) diacetate solutions in industrial applications as a catalyst, should be exempted from an eventual authorization requirement due for four key reasons: - Workplace exposure to Cobalt(II) diacetate in industrial uses, especially when present in aqueous solutions, is very limited as the material is handled in closed continuous processes. - Cobalt(II) diacetate is a critical substance for the European polyester industry as a whole, with two important sites in Germany producing DMT. These sites are already subject to existing regulation that addresses the risks related to Cobalt(II) diacetate - No viable alternatives have been found, despite several decades of research, so a forced introduction of less selective catalysts would destroy the economic viability of the business. - In order to decide whether to include Cobalt(II) diacetate on Annex XIV based on high quality data and information, more time should be allowed for the collection of high quality data and assessment of the actual situation. 2.2.1. Volume(s), imports/exports

			The actual tonnage manufactured/imported needs to be determined with more precision. It is not acceptable to use worst case scenarios (1-10kt) when other information suggests <1kt and at the same time the number of manufacturers / importers seems to be very limited, which should make the determination straight forward and eliminate uncertainties. Using the <1kt tonnage band would reduce the scoring factor V for the volume from 7 to 5. 2.2.2.2. Uses and releases from uses Uses As a catalyst PTA (terephthalic acid) and DMT (dimethylterephthalate) are both key monomers for the manufacture of polyethylenterephthalate polymer which is widely used in fibre, technical filaments, packaging, nonwovens and engineering applications. DMT is in addition used for the manufacture of polybutyleneterephthalate (PBT), a thermoplastic Engineering polymer with end uses in automotive, structural electrical parts and electrical connectors. Approximately 420kt of capacity for DMT manufacturing is currently in operation in the EU in 2 sites in Germany representing 20% of the worldwide capacity. Production of plastics and/or PET: The use of Cobalt(II) diacetate as a polymerisation catalyst is not practiced by industry. The comment about the doubts regarding "the use as a catalyst in the manufacture of PET monomer" is confusing. As stated above, Cobalt(II) diacetate is used as a catalyst in the manufacture of PTA, IPA, DMT, which are all "PET monomers". Releases from uses All Cobalt(II) diacetate used in our DMT plant is received and handled in aqueous solution and therefore no inhalation risk of Cobalt(II) diacetate dusts is present. In case of accidental spills of solution that may then lead to solid Cobalt(II) diacetate due to evaporation of the water, specific operating procedures are in place that address the

			potential risk of dry Cobalt(II) diacetate. The German TRGS905 (May 2008), that lists a large number of CMR substances, specifically only refers to "inhalable" forms of Cobalt(II) diacetate. Furthermore, all handling of Cobalt(II) diacetate solutions and potentially Cobalt containing materials (transfers from tank truck to tank, and then dosing into the reactors, separation of the by-products) happens under closed conditions and strict control. Based on this we do not agree to the generic comment made that the "occupational cancer risk is expected to be high". We do not understand how potential Cobalt exposure of consumers due to 30 year old handpainted dinnerware is related to the current assessment whether the use of Cobalt(II) diacetate in industrial applications needs to be subjected to an authorisation scheme. As you know the use of Cobalt(II) diacetate is permitted in food contact applications following Regulation EC 10/2011, Article 6.3(a) (Salts of Cobalt and authorized acids (e.g. acetic acid) up to a specific migration limit below 0,05 mg/kg food or food simulant. Exposure potential in food contact applications should not be used to justify a potential authorisation of Cobalt(II) diacetate that would include industrial uses. 2.2.2.3. Geographical distribution and conclusions in terms of (organisation and communication in) supply chains Second paragraph: If the conclusion is that Cobalt(II) diacetate has a "medium number of downstream users", why is a factor of 3 (high site #) used in the scoring? Adding all worst case numbers (which exclude catalyst use sites) mentioned in the text gives ca 60. We are currently only aware of 9 sites in the EU that use Cobalt(II) diacetate as a catalyst in the manufacture of PTA/IPA/DMT (Committee of PET Manufacturers in Europe (CPME) information). Adding these would only lead to 69 use sites which is a number "in the tens" rather than "in the hundreds". Based on this, "2" would be more

			appropriate for the site# factor. When only considering the number of sites using Cobalt(II) diacetate in the PTA/IPA/DMT manufacturing, the site# factor would only be "1". 2.3. Availability of information on alternatives The replacement of Cobalt(II) diacetate with other Co-salts (chloride, nitrate or sulfate) would introduce additional new anions into the process during which acetic acid (acetates) is present inherently. Chloride anions for example would very likely lead to increased corrosion issues. As these salts are also proposed for the Annex XIV inclusion, mentioning these as alternatives makes no sense. The use of other catalytic systems has been extensively studied since this technology has been implemented in the ´60 and no viable alternative has emerged. Even if an alternative catalyst would be found, the implementation of the new technology in the currently installed large scale factories would require a massive investment and possible new construction overall. As non-EU manufacturers will be able to continue to use the Cobalt(II) diacetate based technology to make PTA, IPA, DMT and ultimately polyester, and import their products into the EU, the EU based PET manufacturing industry and its EU supply chain would be at a major competitive disadvantage. 2.4. Existing specific Community legislation relevant for possible exemption A potential phase-out of Cobalt(II) diacetate based manufacturing of the aforementioned products in the EU is not needed to reduce exposures to Cobalt(II) diacetate in the EU. Based on the existing directives related to carcinogens and chemical agents and their corresponding national legislation, worker exposure to Cobalt(II) diacetate is already effectively regulated on the EU community level. If potential for high exposure exists within the workplace, rules are in place that require limiting exposure. Measures and techniques are available to achieve this goal. The authorisation of Cobalt(II) diacetate is not needed to better protect potentially exposed workers. EU Regulation EC 10/2011 on food contact materials explicitly mentions salts of cobalt and authorized acids (e.g. acetic acid) as allowed constituent of food contact materials up to a specific migration limit below 0,05 mg/kg food or food simulant. Therefore its potential use in food contact materials would be exempt from authorisation obligations following Art 56.5(b) of REACH and limits the potential exposure to consumers.

			3. Conclusions and justification 3.1. Prioritisation First paragraph: Taking the tonnage information provided by the Co-Consortium into account (<1000 tons) the volume should be rated as "medium". According to the provided numbers in section 2.2.2.3, the number of industrial settings seems to be rather in the <100 range and should be rated also as medium. When considering only the use sites active in PTA/IPA/DMT manufacturing the number of setting should be rated as "low". Second paragraph: The statement "seems to be controlled in most cases" should not be overruled by referring to "some processes" that have a "potentially significant exposure potential". Without evidence about the number of sites that effectively expose workers to significant levels of Cobalt(II) diacetate, the release should be classified as "non-diffuse / controlled" (1). Considering the explanation of the term "wide dispersive use" (quote from "General Approach for Prioritisation of Substances of Very High Concern (SVHCs) for Inclusion in the List of Substances Subject to Authorisation"): "The term 'wide-dispersive use' is explained in Chapter R.16.2.1.6 of the Guidance on Information Requirements and Chemical Safety Assessment as follows: 'Wide-dispersive use refers to many small point sources or diffuse release by for instance the public at large or sources like traffic. … Wide-dispersive use can relate to both indoor and outdoor use'. In the Technical Guidance Document for Risk Assessment of new and existing substances and biocides (2003, Chapter 5) this term is defined as follows: 'Wide-dispersive use refers to activities which deliver uncontrolled exposure. Examples relevant for occupational exposure: Painting with paints; spraying of pesticides. Examples relevant for environmental/consumer exposure: Use of detergents, cosmetics, disinfectants, household paints.' In addition, the ECETOC Report No. 93 on Targeted Risk Assessment (Appendix B)

			states: 'A substance marketed for wide-dispersive use is likely to reach consumers, and it can be assumed that such a substance will be emitted into the environment for 100% during or after use.' Based on this we are of the opinion that the current industrial uses of Cobalt(II) diacetate do not meet the definition of "wide dispersive use" which is linked to the maximum score of 9 in the scoring approach. Scoring approach (Table) Applying the factors proposed above would give: Total Score = IP (0-1) + V (5) + WDU (2*1) = 7-8. The total score for the PTA/IPA/DMT sites would be: Total score = IP (0-1) + V (5) + WDI (1*1) = 6-7 On that basis the priority for inclusion would be significantly lower. Conclusion, taking regulatory effectiveness considerations into account First paragraph: We do not share this conclusion. The substance would get a much lower priority. Second paragraph: As stated above replacement of Cobalt(II) diacetate in the uses relevant for the polyester industry by other Cobalt salts is unlikely, therefore a grouping with these substances is not justified from that perspective. With respect to regulatory effectiveness it needs to be taken into account that existing rules and regulations dealing with CMR substances at the workplace are in place already. Requiring authorisation for the continued use of Cobalt(II) diacetate will not increase the level of protection at sites that currently comply with the existing rules. Exposure of consumers to Cobalt(II) diacetate as a substance seems very unlikely and

			cannot justify an authorisation requirement. Cobalt2+ exposure of consumers coming from food contact materials is already regulated via the food contact regulations.
945	2011/09/13 12:36 File attached Confidential	Company Germany	General comment summarizing our point of view: Based on the use and exposure information, the use of aqueous Cobalt(II) diacetate solutions in industrial applications as a catalyst, should be exempted from an eventual authorization requirement due for four key reasons: - Workplace exposure to Cobalt(II) diacetate in industrial uses, especially when present in aqueous solutions, is very limited as the material is handled in closed continuous processes. - Cobalt(II) diacetate is a critical substance for the European polyester industry as a whole, with two important sites in Germany producing DMT. These sites are already subject to existing regulation that addresses the risks related to Cobalt(II) diacetate - No viable alternatives have been found, despite several decades of research, so a forced introduction of less selective catalysts would destroy the economic viability of the business. - In order to decide whether to include Cobalt(II) diacetate on Annex XIV based on high quality data and information, more time should be allowed for the collection of high quality data and assessment of the actual situation. 2.2.1. Volume(s), imports/exports

			The actual tonnage manufactured/imported needs to be determined with more precision. It is not acceptable to use worst case scenarios (1-10kt) when other information suggests <1kt and at the same time the number of manufacturers / importers seems to be very limited, which should make the determination straight forward and eliminate uncertainties. Using the <1kt tonnage band would reduce the scoring factor V for the volume from 7 to 5. 2.2.2.2. Uses and releases from uses Uses As a catalyst PTA (terephthalic acid) and DMT (dimethylterephthalate) are both key monomers for the manufacture of polyethylenterephthalate polymer which is widely used in fibre, technical filaments, packaging, nonwovens and engineering applications. DMT is in addition used for the manufacture of polybutyleneterephthalate (PBT), a thermoplastic Engineering polymer with end uses in automotive, structural electrical parts and electrical connectors. Approximately 420kt of capacity for DMT manufacturing is currently in operation in the EU in 2 sites in Germany representing 20% of the worldwide capacity. Production of plastics and/or PET: The use of Cobalt(II) diacetate as a polymerisation catalyst is not practiced by industry. The comment about the doubts regarding "the use as a catalyst in the manufacture of PET monomer" is confusing. As stated above, Cobalt(II) diacetate is used as a catalyst in the manufacture of PTA, IPA, DMT, which are all "PET monomers". Releases from uses All Cobalt(II) diacetate used in our DMT plant is received and handled in aqueous solution and therefore no inhalation risk of Cobalt(II) diacetate dusts is present. In case of accidental spills of solution that may then lead to solid Cobalt(II) diacetate due to evaporation of the water, specific operating procedures are in place that address the

			potential risk of dry Cobalt(II) diacetate. The German TRGS905 (May 2008), that lists a large number of CMR substances, specifically only refers to "inhalable" forms of Cobalt(II) diacetate. Furthermore, all handling of Cobalt(II) diacetate solutions and potentially Cobalt containing materials (transfers from tank truck to tank, and then dosing into the reactors, separation of the by-products) happens under closed conditions and strict control. Based on this we do not agree to the generic comment made that the "occupational cancer risk is expected to be high". We do not understand how potential Cobalt exposure of consumers due to 30 year old handpainted dinnerware is related to the current assessment whether the use of Cobalt(II) diacetate in industrial applications needs to be subjected to an authorisation scheme. As you know the use of Cobalt(II) diacetate is permitted in food contact applications following Regulation EC 10/2011, Article 6.3(a) (Salts of Cobalt and authorized acids (e.g. acetic acid) up to a specific migration limit below 0,05 mg/kg food or food simulant. Exposure potential in food contact applications should not be used to justify a potential authorisation of Cobalt(II) diacetate that would include industrial uses. 2.2.2.3. Geographical distribution and conclusions in terms of (organisation and communication in) supply chains Second paragraph: If the conclusion is that Cobalt(II) diacetate has a "medium number of downstream users", why is a factor of 3 (high site #) used in the scoring? Adding all worst case numbers (which exclude catalyst use sites) mentioned in the text gives ca 60. We are currently only aware of 9 sites in the EU that use Cobalt(II) diacetate as a catalyst in the manufacture of PTA/IPA/DMT (Committee of PET Manufacturers in Europe (CPME) information). Adding these would only lead to 69 use sites which is a number "in the tens" rather than "in the hundreds". Based on this, "2" would be more

			appropriate for the site# factor. When only considering the number of sites using Cobalt(II) diacetate in the PTA/IPA/DMT manufacturing, the site# factor would only be "1". 2.3. Availability of information on alternatives The replacement of Cobalt(II) diacetate with other Co-salts (chloride, nitrate or sulfate) would introduce additional new anions into the process during which acetic acid (acetates) is present inherently. Chloride anions for example would very likely lead to increased corrosion issues. As these salts are also proposed for the Annex XIV inclusion, mentioning these as alternatives makes no sense. The use of other catalytic systems has been extensively studied since this technology has been implemented in the ´60 and no viable alternative has emerged. Even if an alternative catalyst would be found, the implementation of the new technology in the currently installed large scale factories would require a massive investment and possible new construction overall. As non-EU manufacturers will be able to continue to use the Cobalt(II) diacetate based technology to make PTA, IPA, DMT and ultimately polyester, and import their products into the EU, the EU based PET manufacturing industry and its EU supply chain would be at a major competitive disadvantage. 2.4. Existing specific Community legislation relevant for possible exemption A potential phase-out of Cobalt(II) diacetate based manufacturing of the aforementioned products in the EU is not needed to reduce exposures to Cobalt(II) diacetate in the EU. Based on the existing directives related to carcinogens and chemical agents and their corresponding national legislation, worker exposure to Cobalt(II) diacetate is already effectively regulated on the EU community level. If potential for high exposure exists within the workplace, rules are in place that require limiting exposure. Measures and techniques are available to achieve this goal. The authorisation of Cobalt(II) diacetate is not needed to better protect potentially exposed workers. EU Regulation EC 10/2011 on food contact materials explicitly mentions salts of cobalt and authorized acids (e.g. acetic acid) as allowed constituent of food contact materials up to a specific migration limit below 0,05 mg/kg food or food simulant. Therefore its potential use in food contact materials would be exempt from authorisation obligations following Art 56.5(b) of REACH and limits the potential exposure to consumers.

			3. Conclusions and justification 3.1. Prioritisation First paragraph: Taking the tonnage information provided by the Co-Consortium into account (<1000 tons) the volume should be rated as "medium". According to the provided numbers in section 2.2.2.3, the number of industrial settings seems to be rather in the <100 range and should be rated also as medium. When considering only the use sites active in PTA/IPA/DMT manufacturing the number of setting should be rated as "low". Second paragraph: The statement "seems to be controlled in most cases" should not be overruled by referring to "some processes" that have a "potentially significant exposure potential". Without evidence about the number of sites that effectively expose workers to significant levels of Cobalt(II) diacetate, the release should be classified as "non-diffuse / controlled" (1). Considering the explanation of the term "wide dispersive use" (quote from "General Approach for Prioritisation of Substances of Very High Concern (SVHCs) for Inclusion in the List of Substances Subject to Authorisation"): "The term 'wide-dispersive use' is explained in Chapter R.16.2.1.6 of the Guidance on Information Requirements and Chemical Safety Assessment as follows: 'Wide-dispersive use refers to many small point sources or diffuse release by for instance the public at large or sources like traffic. … Wide-dispersive use can relate to both indoor and outdoor use'. In the Technical Guidance Document for Risk Assessment of new and existing substances and biocides (2003, Chapter 5) this term is defined as follows: 'Wide-dispersive use refers to activities which deliver uncontrolled exposure. Examples relevant for occupational exposure: Painting with paints; spraying of pesticides. Examples relevant for environmental/consumer exposure: Use of detergents, cosmetics, disinfectants, household paints.' In addition, the ECETOC Report No. 93 on Targeted Risk Assessment (Appendix B)

			states: 'A substance marketed for wide-dispersive use is likely to reach consumers, and it can be assumed that such a substance will be emitted into the environment for 100% during or after use.' Based on this we are of the opinion that the current industrial uses of Cobalt(II) diacetate do not meet the definition of "wide dispersive use" which is linked to the maximum score of 9 in the scoring approach. Scoring approach (Table) Applying the factors proposed above would give: Total Score = IP (0-1) + V (5) + WDU (2*1) = 7-8. The total score for the PTA/IPA/DMT sites would be: Total score = IP (0-1) + V (5) + WDI (1*1) = 6-7 On that basis the priority for inclusion would be significantly lower. Conclusion, taking regulatory effectiveness considerations into account First paragraph: We do not share this conclusion. The substance would get a much lower priority. Second paragraph: As stated above replacement of Cobalt(II) diacetate in the uses relevant for the polyester industry by other Cobalt salts is unlikely, therefore a grouping with these substances is not justified from that perspective. With respect to regulatory effectiveness it needs to be taken into account that existing rules and regulations dealing with CMR substances at the workplace are in place already. Requiring authorisation for the continued use of Cobalt(II) diacetate will not increase the level of protection at sites that currently comply with the existing rules. Exposure of consumers to Cobalt(II) diacetate as a substance seems very unlikely and

			cannot justify an authorisation requirement. Cobalt2+ exposure of consumers coming from food contact materials is already regulated via the food contact regulations.
888	2011/09/13 11:44 File attached	Company Belgium	there is no wide-dispersive use of the substance in the glass making process. Moreover, since Cobalt Sulfate is used as an intermediate (ERC6A)4, it does not reach the consumer nor can be emitted into the environment during the use phase of glass products.

865	2011/09/13 01:01 File attached Confidential	BP Chembel NV Company Belgium	General Comments BP Chembel is an Associate Member of Committee of PET Manufacturers in Europe (CPME) and agrees with the comments that have been submitted to this consultation by CPME. It is noted that previous CPME comments to consultations contributed to the Netherlands were only partially taken into account and as such the background information behind the proposal for Authorisation is considered to be incomplete and somewhat confused. Further information has recently become available to Industry, which has direct relevance to the understanding of how cobalt diacetate is used, both as catalyst and in other uses. Important regulatory decisions MUST be based on sound information to avoid wasting regulatory resources and causing unjustifiable damage to industry a) Time should be allowed for additional information to be made available before final decisions are made. The cobalt industry and CPME have been working to collate a better understanding of the use of this substance. b) Current information indicates that the ECHA prioritisation greatly overestimated the level of concern because it was not based on the correct facts. This means that the decision to propose cobalt diacetate for authorisation should be revisited in the light of the new information. c) In PTA catalyst use, cobalt diacetate is handled only as a solution and under strictly controlled conditions. Worker exposure is below detectable limits with standard analytical methods and in any case much lower than established occupational exposure limits . d) A balanced and informed reassessment is considered essential for the process to retain credibility. Decisions in the process should be proportionate and based on facts. In relation to section 2.1 Intrinsic Properties (page 1) : BP Chembel accepts the classification of cobalt diacetate as set out by the ECHA proposal but notes that the carcinogenicity classification is restricted to exposure by the inhalation route. In our operations all cobalt diacetate used as a catalyst in terephthalic acid (PTA) manufacture is handled as a solution in acetic acid which removes the risks of inhalation associated with handling the crystallised salt. There is considered to be a justifiable case documented in the REACH registration dossiers for considering cobalt diacetate as a threshold carcinogen. As a carcinogen, cobalt diacetate is handled in line with the Carcinogens Directive. Worker exposure in the elements of our PTA manufacturing operation where cobalt diacetate is used is zero or minimal and it is used in closed systems. Measured exposure data show under operational conditions exposures to airborne cobalt in the areas of the PTA plant where cobalt diacetate is employed are non-detectable with limits of detection of eg 0.06 -

			3.1 µg/m3(as cobalt) . These limits of detection are therefore well below the DNEL of 40µg/m3 (as cobalt)and below the National occupational exposure limit of 20µg/m3 (as cobalt) In relation to section 2.2.1. Volume(s), imports/exports (Page 1) : The ECHA Background document is considered to overestimate the amount of cobalt diacetate in use across EU industry as a whole. This significant overestimate (range 1000-10000 tonnes/year) adds undue weighting to the scoring approach prioritisation presented in Section 3.1 (page 7). CPME data indicates that less than 450 tonnes of cobalt diacetate were used as catalyst in the manufacture of 3.9 million tonnes of PTA, IPA and DMT in Europe in 2011 and information from Cobalt Development Institute suggests that this use constitutes 70-80% of the total volume of cobalt diacetate used in the EU. In relation to 2.2.2.2. Uses and releases from uses (pages 4-5) Use of cobalt diacetate as a catalyst in the manufacture of PTA (and IPA plus DMT) is the predominant use of this substance but also one in which occupational exposure is tightly controlled. We do not consider that the high occupational exposure levels reported by Netherlands and Germany are applicable to or representative of the use of cobalt diacetate in the manufacture of PTA. As such, in terms of the highly controlled use of cobalt diacetate as a catalyst in PTA manufacture, we would strongly disagree with the comment from the German MSCA that "on the basis of toxicological and exposure data in the open literature the occupational cancer risk is expected to be high". In catalyst use for PTA manufacture, cobalt diacetate is handled as a solution in acetic acid within closed process equipment under strictly controlled conditions. These operations are only carried out at specialist petrochemical industry industrial sites. Periodic air monitoring conducted at our EU manufacturing site shows that airborne cobalt concentrations measured were below the level of detection where the analytical level of detection is much lower than both the exposure data cited in the ECHA/Netherlands documentation and the REACH registration dossier DNEL (40ug/m3). In relation to 2.2.2.3. Geographical distribution and conclusions in terms of (organisation and communication in) supply chains (page 5) : The use of cobalt diacetate as a catalyst in the manufacture of PTA, IPA and DMT takes place at a small number of sites (9, with a further plant to open at the end of 2011) under strictly controlled conditions. This does not match the "high volume use" described in the draft recommendation nor does it meet the criteria for a Widely Dispersed Use. As "high volume use" and "widely dispersed use" were material issues in the arguments for

			prioritising cobalt diacetate this decision should be revisited. In relation to 2.3. Availability of information on alternatives There is currently no suitable replacement for cobalt diacetate in the manufacture of PTA, IPA and DMT: ☐ Cobalt diacetate has been used in the catalyst system since the manufacture of PTA, IPA and DMT began more than 50 years ago; ☐ Every manufacturer of PTA, IPA and DMT worldwide uses cobalt diacetate in their catalyst system; ☐ Numerous research programmes have been conducted to attempt to identify a suitable replacement for cobalt diacetate – so far without success. BP Chembel is able to quantify the significant funding applied to such research within BP over a number of decades and it is clear that none of the potential alternative catalyst candidates considered would be a realistic replacement. ☐ The perspective that the catalyst system is already optimised and by implication would be very difficult to substitute is recognised in a recent publication ["The Aerobic Oxidation of p-xylene to Terephthalic acid : a Classic Case of Green Chemistry in Action" Partenheimer W & Poliakoff M in Handbook of Green Chemistry vol 1 Homogenous Catalysis, 2009, Wiley VCH, Weinheim] In relation to Interchangeability of Cobalt Diacetate with the Carbonate, Dichloride, Dinitrate and Sulfate Salts The grouping of the 5 cobalt salts in the Authorisation proposal is based on the assertion that the salts are interchangeable and so require common regulatory measures. This is considered to be an erroneous assumption. The other 4 Cobalt salts proposed for Authorisation (dichloride, disulfate, dinitrate and carbonate) CANNOT replace cobalt diacetate as a catalyst component in the manufacture of PTA (or IPA and DMT) for the following reasons :- ☐ The manufacturing process uses acetic acid as a solvent so use of the acetate salt does not introduce a contaminating anion; ☐ Chloride and Sulphate anions adversely impact noble metal catalysts used in the manufacturing process; ☐ Nitrates generate NOx off gasses; ☐ Chloride ions attack the stainless steel plant; ☐ Chloride ions also react to produce undesirable by-products; ☐ Carbonates are insoluble solids and would need to be converted to acetates to become an active catalyst;

			☐ Using Carbonates would involve powder handling, potentially increasing the risk for inhalation exposure to cobalt. On this basis there is considered to be no rationale for grouping the use of cobalt diacetate with the other salts proposed for authorisation because there is NO interchangeability for this catalyst application. In relation to 3.1. Prioritisation (pages 6-7) : Verbal-argumentative approach: Given that the major use of cobalt diacetate (70-80%) is as a catalyst for the manufacture of PTA, IPA and DMT, that less than 500 tonnes/a are used in this application, that the powder form is not handled and that these operations are carried out under strictly controlled conditions, cobalt diacetate is clearly NOT a high volume dispersive use substance as proposed by ECHA. This use does not give rise to any significant level of occupational exposure in our experience. It is noted that in this catalyst application the substance is handled in the same manner as an intermediate under strictly controlled conditions but because it is a catalyst use and does not meet the REACH definition of an intermediate it is not exempt from authorisation as an intermediate would be. This suggests that disproportionate regulation is being applied to this catalyst use compared to an intermediate substance handled under the same strictly controlled conditions. Scoring Approach: The scoring approach should be revised to take account of the new information available on cobalt diacetate. Using the ECHA scheme [General Approach for Prioritisation of Substances of Very High Concern (SVHCs) for Inclusion in the List of Substances Subject to Authorisation] a score can be derived as follows – • Intrinsic Properties (threshold carcinogen) - score 0 • Volume (100-1000 tes/a) - score 5 • Wide Dispersive Use 2 (10-100 sites) * 1 (non diffuse/controlled) = - score 2 TOTAL score = 7 This is in significant contrast to the ECHA proposal which derived a score of 16/17 based on erroneous inputs. On this basis the Prioritisation that has been carried out based on inappropriate data is considered to be flawed and the case for cobalt diacetate being subject to authorisation should be reconsidered. Furthermore if a tier II prioritisation process were applied [Consideration of relevant information regarding regulatory coherence and effectiveness] then it is clear that in the

			case of the major use (catalyst under strictly controlled conditions) it would be apparent that no significant regulatory benefit would accrue from applying Authorisation to the main use of cobalt diacetate. Note concerning this Application for cobalt diacetate The use of cobalt diacetate as an oxidation catalyst is absolutely vital to the manufacture of PTA in the European Union (and also to the manufacture of isophthalic acid – IPA and dimethyl terephthalate – DMT). Cobalt diacetate is currently used as a catalyst for the manufacture of polyester monomers (PTA, IPA and DMT) at 9 sites within the EU. Interference with the use of cobalt diacetate in this critical application would directly impact the European polyester monomer and associated manufacturing industry (PTA ,IPA and DMT plus mixed xylenes, p-xylene and ethylene glycol). This industry employs 2700 workers at 31 sites across 9 EU Member States, producing 8.7m tonnes of products and generates revenue of 9 billion Euros per annum. Additionally, this would also impact the downstream polyester manufacturing industry that employs 13400 workers at 58 sites across 14 EU Member States and generates another 9 billion Euros per annum (Source PCI Consulting 2011 data . These numbers do NOT include the polyester downstream processing sector). In Europe, The PET bottle resin sector represents the most significant market sector for EU producers with three main outlets: - Drink packaging (73%)– for soft drinks, waters, fruit juices, wine, spirits and beer, - Packaging including Food (12%) – for edible oils, vinegars, fruit, meat and fresh pasta, Industrial sheets (15%) – for tough, clear sheets which can be thermoformed (i.e. heated and moulded to specific shapes). PET exhibits a superior life cycle impact and is the widest recycled polymer.

841	2011/09/12 19:02 File attached	LKS Kronenberger GmbH Metallveredlungswerk Company Germany	LKS Kronenberger GmbH Metallveredlung will give the same comments to Cobalt(II)-Diacetatee like done by Cobalt(II)-Chlorid. To avoid repeating the same arguments many times please see our comments on Cobalt(II)-Chlorid made at the same day !
830	2011/09/12 17:54	Reactana Katalysatoren und Chemikalien GmbH Company Germany	A) General statement on Cobalt Diacetate manufactured by Reactana GmbH All Cobalt Diacetate produced by Reactana GmbH has always been present in form of an aqueous solution, only. It has been manufactured and stored under strictly controlled conditions in closed systems, transported in Road Tankers to three different industrial sites in Europe, where it is being exclusively used as a liquid catalyst. At no stage of production or catalyst use is Cobalt Diacetate present in form of cristalline material, powder or other respirable forms. There is no exposition of workers to Cobalt Diacetate, neither during manufacture, nor during storage or use as a catalyst. This applies even more to the exposure of the general population to Cobalt Diacetate. There is simply none. The tonnage of Cobalt Diacetate we are producing per annum is varying in the range of 250 to 350 tpa, equivalent to aqueous solution of Cobalt Diacetate between 1000 and 1500 tpa. Cobalt Diacetate solution has been manufactured by Reactana GmbH and used by its Catalyst Customers in tens of thousands of tonnes since 30 years. There was never a report on an accident or disease, attributed to Cobalt Diacetate. There are at least three different technical processes in use by the industry for the manufacture of DMT, TPA or PTA. All have been using Cobalt Diacetate as the only suitable catalyst, which was the result of extensive catalyst research over years. There is no potential substitution for Cobalt Diacetate in any of these technical processes. B) Important remarks disputing the SVHC classification by RIVM in the Netherlands, referring to:

			ANNEX XV REPORT, "PROPOSAL FOR IDENTIFICATION OF A SUBSTANCE AS A CMR CAT 1 OR 2, PBT, vPvB OR A SUBSTANCE OF AN EQUIVALENT LEVEL OF CONCERN" Evaluation of Health hazards The most important conclusion is, that there are no studies and no experience that reveal and account for the specific risk for Cobalt Diacetate. Reference is always been made to studies with cobalt metal, cobalt oxide, hard metal processing or to studies with cobalt sulfate/cobalt chloride. With that, it is alleged that the toxicity refers alone to the cobalt II ion and thus, the conclusion by analogy is pretended to be acceptable. The acute toxicity, the irritation, and the corrosivity (itching effect) are not dealt with in the RIVM dossier, although reference would have to have been made to these data, for example, the justification for the conclusion by analogy. The sensitization and the toxicity in the case of repeated administration are not dealt with although indications about the toxicity vis-à-vis the immune system or chronic effects would have been important. Although it is always claimed that the anhydrous form of salts and the hydrated form of salts behave the same and with that, the same classification is justifiable, one can see that with in vitro mutagenicity, both substance forms have different characteristics (See p. 29). This alone already questions/challenges the conclusion by analogy. Human data that is specific to Cobalt Diacetate and its hydrates is not available! The thorough presentation of the characteristics of the cobalt dichlorides does not help any further, since the anhydrous and hydrated form of the Cobalt Diacetate differ in their behavior. The expansion of the listing of the mutagen effects of other cobalt compounds (from hard metals) or cobalt sulfide or cobalt (III) nitrate (!) cannot hide that Cobalt Diacetate is not sufficiently evaluated, nor does it show respective effects! (See p. 32) 1.7.3.2. Human data Specific data on Cobalt Diacetate is totally missing. Reference is again made to cobalt metal and, most especially, to mixed exposure or exposure for heavy smokers. This is not relevant for Cobalt Diacetate. 1.7.4 From the few available experiments with cobalt salts other than Cobalt Diacetate, the genotoxic potential can be estimated to be very weak. The statement that cobalt metal and many cobalt compounds are genotoxic is meaningless, because these are not genotoxic! 1.8 Cancerogenity, carcinogenity 1.8.1 There have been no studies conducted with Cobalt Diacetate or its hydrate that point

			to carcinogenic effects after oral, dermal or inhaled exposure! 1.8.2 Human data There are no studies that point to cancerous effects via Cobalt Diacetate or its hydrates in humans!!! 1.8.3.2 Epidemiological studies Also in these cases, only cobalt sulfate or cobalt was examined as an initiating factor. There are no case studies on Cobalt Diacetate!!! 1.8.3.3 IARC Evaluation In 2006, the IARC classified cobalt metal with tungsten carbide as being a probable carcinogenic for humans and Category 2A, cobalt metal without tungsten carbide and cobalt sulfate and soluble cobalt (II) compounds as possibly carcinogenic for humans, Category 2B (suspected material), (p. 38). 1.9 Reproductive toxicity 1.9.1 Effects on the reproductive capacity There are no specific examinations with cobalt diacetate in this context. 1.9.3.3 Human data Women whose hematocrit and hemaglobin values needed to be enhanced while pregnant, were administered 90 day long doses of 0.6 mg cobalt/kg/day. No developmental disturbances of the fetuses were detected. Longer administrations were not possible, since developmental damages to the fetuses could first occur in the last third of the pregnancy, as was apparently proven in previous examinations. These results are from the 50ies. The treatment was conducted in the 50ies (p. 41). There are no studies with cobalt diacetate with respect to reproduction toxicity. With cobalt (II) chloride, damages to offspring were detected in rats and mice if the doses were so high that the mother sample had already been damaged. This means that we are dealing with physiological tests, whose results cannot be made use of for classification. The cobalt compounds are shown not be teratogenic. The technical dossier, the material safety report and the exposure scenarios presented with REACH - Registration should be used as the basis for a decision whether a substance, possibly a substance group, should be subjected to an authorisation procedure or not. It is truly peculiar that an entire substance group (namely the inorganic cobalt compounds) is subjected to an authorisation procedure. It is even more peculiar that restriction dossiers (RIVM) have been processed and completed before the compounds in question were even registered. About the information available in the restriction dossier

			The fact that cobalt is an important trace element is not mentioned, but it should be! Cobalt deficiency leads to sickness in both livestock and humans. The cancerogenity studies for cobalt chloride and cobalt sulfate are simply transferred to Cobalt Diacetate indiscriminately. The studies sometimes work with such high doses that they lead to acute damaging effects, for example, to oral pharyngeal membranes in experiments dealing with inhalation. The same can be said of the examinations for reproductive toxicity. When the childbearing mother sample has suffered damages due to high doses, then it is certainly no wonder that the offspring come out damaged or die off, or that reproduction simply no longer takes place. These are non-physiological tests! Overall, the RIVM dossier is not sufficient in proving the carcinogenity as per Article 57a and the impairment of reproduction via Cobalt Diacetate as per Article 57c. The substance dossier for Cobalt (II) Acetate and the material safety report should be used to decide whether an admission and restriction procedure is required, that is, whether the material-related dangers are even dangerous enough to justify such procedures! It cannot be perceived or accepted why RIVM have produced a separate report. C) Minimal Risk Level, MRL The MRL definition would be important! These values are derived in order to determine whether the public health is endangered by a rate of exposure considered to be too high. The derived values are oriented on exposure that has been present for a very long time (for example, 1958, see p.23) and thus, are only valid to a certain degree from a current viewpoint. In order to be able to carry out this evaluation, the DNEL or DMEL concepts were created by the REACH-Regulation. These values are provided in the material safety report or in the exposure scenarios for Cobalt Diacetate and should be used as a basis. These values are be of importance for this discussion, and thus, this is why a comparison is provided: MRL per inhalation: 0.0001 mg cobalt/m3 - For chronic inhalation: 0.1□g/m3 Derived from NOAEL of 0.0053 mg Cobalt/m3: 5.3 □g/m3 Derived from LOAEL of 0.0151 mg Cobalt/m3: 15.1 □/m3 MRL for oral administration: 0.01 mg Cobalt/kg/day - 10 □g/m3 For comparison: The material safety report lists the following DNELs. (See p. 157 ff): DNEL for long-term local effects:

			120.2 □g /m3 – derived from human data DNEL long-term systematic effects: 28.5 □g/kg – body weight (abbreviation: BW) DNEL for carcinogenity: 18.9 □g/m3 For comparison: The daily dosage that a human should take should be 3 □g of cobalamin (Vitamin B12) The toxic effects for a human are to be expected as of 25-30 mg/day. Woman during pregnancy tolerated (without damage) 0.5 mg/kg/day for 3 months, however not in the last third of the pregnancy. D) Conclusion by analogy /Principle of analogy (read across according to REACH) The conditions for substance group considerations are detailed in Annex XI of the REACH-Regulation. The materials should not only be chemically similar, but should also show a similar chemical and physical behavior. The proof of this similarity must be provided. One cannot simply, for example, flat out omit a comparison of the physio-chemical parameters! The anions are of great importance to the biological behavior of the substance, even when this matter of fact is disclaimed in the RIVM dossier! The difference in the toxicity of the anions is a matter of fact that is made regular use of in pharmacology! The reason for this partially results from the various ion volumes, which determine the ion movement, which is then added to the possibility for hydration (water bonding) and in all, to complexes. Here is an example in order to more clearly clarify this matter of fact: SCN´> |F´>J´>Br´>Cl´>SO4 ´´: that is, thiocyanate ions inhibit the succinic acid dehydrogenase in a much stronger manner than the sulfate anion. This means that the remaining acetate cannot go without influencing the substance exchange (and could not possibly even weaken the cancerous effect of the cobalt). To make a long story short, the uncontrolled equation of the cobalt compounds with respect to their possible toxicological effects is surely incorrect! This can be seen in the effect/non-effect in the case of mutagenicity. In special examinations, cobalt diacetate is mutagenic and the tetrahydrate does not show any effect! The following tables show the differences between the cobalt salts Substance/CAS Solubility/Water pH CobaltCobalt(II)-nitrate 10026-22-9 134g/l ; 0°C . 4

			Cobalt(II)-acetate 71-48-7 380 g/l ; 25°C . 7,2 Cobalt(II)-sulfate 10124-43-3 393 g/l ; 25°C 4 Cobalt(II)-chloride 7646-79-9 529 g/l ; 20°C 4,9 The table was taken from: German MAK-List, Assessment, 2001 The table shows: the solubility of Cobalt acetate and Cobalt sulfate are similar, but the pH show differences: the Cobalt (II)Acetate solution will react like a weak Base and the Cobalt sulfate will react like a typical acid! The solubility cannot be the basis for the assessment of the biological availability in the organism. Another analytical test, done by REACTANA GMBH shows more detailed information: 1. Conductivity Conductivity of some Cobalt Salts depending on the concentration of Cobalt 2+ % Co2+ m/m 6,00 0,60 0,01 0,006 0,0006 Sulfate mS/cm 44,4 8,28 1,325 0,197 0,024 Chloride mS/cm 107,1 15,83 1,921 0,216 0,024 Nitrate mS/cm 100,8 14,22 1,671 0,189 0,021 Diacetate mS/cm 20,3 7,9 1,251 0,151 0,017 2. pH pH of some Cobalt Salts depending on their concentration in water % Co2+ m/m 6,0 0,60 0,01 0,006 0,0006 Sulfate pH 2,94 3,93 4 ,83 5,51 5,89 Chloride pH 4,92 5,54 5,66 5,79 5,81 Nitrate pH 2,26 3,78 4,91 5,42 5,93 Diacetate pH 6,4 7,35 7,07 6,59 6,12 The test results support our opinion that the cobalt salts show a different chemical and physical-chemical behavior and therefore we have to expect a different behavior in living processes, as shown in the results of the testing for cancer, germ cell mutagenicity or reproductive toxicology. Therefore read across from Cobalt Sulfate to Cobalt Diacetate is impossible. And the results of the testing of Cobalt Sulfate cannot be the basis for the classification of Cobalt Diacetate. Biebesheim, 15.08.2011

799	2011/09/12 16:16	Company United Kingdom	Our company provides comments as EU producer of Cobalt di(acetate). Our company is member of the Cobalt REACh Consortium and as such, participated to its mapping exercise and provided information on tonnages, manufacture, uses and releases; aggregated results from this exercise are available from the Consortium and in the REACh registration dossier. Manufacture and releases from manufacture (section 2.2.2.1. – page 2): We do not think that exposure data reported in the Lison study from 1994 are relevant to describe the current EU manufacturing releases: this study appears not to be specific to Cobalt diacetate exposure and is quite old to be representative of current practice. Updated exposure data from manufacture have been provided in REACh registration dossiers (prepared by Cobalt REACh Consortium) and can be used as reference. Uses and releases from uses (section 2.2.2.2. – pages 2 to 4): We confirm the following uses on customers' information: • Use as a catalyst: This is the major use. Cobalt diacetate is used as catalyst to produce Purified Terephthalic Acid (PTA). Other customers report to use Cobalt diacetate as catalyst to produce benzoic acid, phthalic derivatives and to polymerize PET resins. Customers confirmed that there is no Cobalt diacetate present in next process step, which means that there is no further exposure to Cobalt diacetate in such applications. • Use in surface treatments applications: This includes plating and passivations applications. For surface treatment applications, Cobalt diacetate is mainly used in solid form. • Use in pigments/dyes applications:

			Cobalt diacetate is used as color modifier in PET polymers. Customers report also the use of Cobalt diacetate in dyes. • Use in animal feed – exempted from Authorisation: Use in animal feed is covered by the feed safety regulation (EC 178/2002) and, as such, is exempted from Authorisation. • Use as intermediate in the manufacture of other chemicals – exempted from Authorisation: This includes manufacture of certain catalysts (Cobalt diacetate is transformed into another substance used as a catalyst) and wet chemical processes. Such uses are exempted from Authorization (Title 1 – Article 2 – 8b). We are also aware of the use of Cobalt acetate solid products in specific rubber adhesion applications. This use represents few tons of Cobalt acetate per year. We do not think that the exposure data from Danish Environmental Agency are relevant: they appear not to be specific to Cobalt diacetate. Similarly, the dust concentrations measured in production facilities and refineries have not been identified to be specifically Cobalt diacetate dusts. We also consider the study on porcelain dinnerware (1970's) too old to be representative of current practices; once again, we do not know if results are specific to Cobalt diacetate. Updated exposure data from uses have been provided in REACh registration dossiers (prepared by Cobalt REACh Consortium) and can be used as reference. Main hazard identified is via inhalation. Part of Cobalt diacetate is produced and sold as solution in water; in this case, there is no risk of exposure in good handling practices. On top of that, Cobalt diacetate in solid form is a crystal, therefore the inhalation risk is minimal. Availability of information on alternatives (section 2.3. – page 6): Even a number of common uses have been registered for Cobalt diacetate and other salts, the assumption of mutual substitution is incorrect. Our customers confirmed that the uses of Cobalt diacetate are very specific and no substitution is available including the substitution by any other Cobalt salt. More particularly, the use of Cobalt acetate as catalyst appears to be very specific and essential for the supply chain. Existing specific Community Legislation relevant for possible exemption (section 2.4. – page 6): The use of Cobalt diacetate in animal feed falls under the scope of food safety regulation (EC 178/2002) and, as such, is exempted from Authorisation.

			As per REACh legislation (Title 1 – Article 2 – 8b), intermediate uses are exempted from Authorisation. Some specific uses – manufacture of other chemicals (including some wet processes and the use of Cobalt acetate to manufacture catalysts) - could be exempted. On top of that, CMR compounds are already covered by other legislations including: the Carcinogens Directive 90/394/EEC, Directive 98/24/CE, Directive 2004/37/EC and IPPC directive (Dir. 2008/1/EC) cover already risk management of carcinogens at work. Global comments on prioritization (section 3.1. – page 6): Based on information gathered, we do not think that Cobalt diacetate should be placed on Annex XIV. Reasons are the followings: • Uses in animal feed and to manufacture other chemicals fall under Authorisation exemptions, • Downstream users in the catalyst industry – main use - confirm that there is no Cobalt acetate present in further process step. The use of Cobalt acetate in catalyst industry is also carried out under well-controlled conditions. • For risk management, uses not exempted from Authorisation are already covered by other legislations. • Assumption on interchangeability is not correct and uses are specific to Cobalt diacetate only. • New data available tend to show a carcinogen threshold mechanism.
797	2011/09/12 16:09 File attached	Company Spain	We believe that background information behind the proposal for Authorisation is incomplete and somewhat confused. Time must be allowed for sound information to be made available before final decisions are made. Based on actual technological and regulatory knowledge, and taking into account the specific use of Cobalt Acetate as oxidative catalyst of p-Xylene and m-Xylene in manufacture of Terephthalic Acid (PTA) and Isophthalic Acid (PIA) and as well as, their use in the manufacture of Dimethyl Terephthalate (DMT) respectively, we would like to make a number of general considerations, that we believe extremely important, for our business and its next future: • Cobalt Diacetate is only used as a catalyst, solubilised in acetic acid in closed systems, at a small number of industrial sites in Europe (ca 10 in 2011 for the manufacture of PTA, PIA and DMT) , with no exposure to the general population. Therefore, it is NOT a wide-dispersive use. • Additionally, there is no downstream user exposure, since residuals amount are

			below 1 ppm in PTA and moreover Cobalt is not released out of PTA/PIA/DMT final products and from PET matrix. • Low volume of Cobalt Diacetate used as catalyst in the manufacture of PTA, PIA and DMT - 4 M tonnes of PTA/PIA/DMT. • As cobalt diacetate has been classified as carcinogen 1B and mutagen 1B, it is already subject to very stringent European and national regulations (see below), in order to guarantee zero to minimal occupational exposure, by means of application of tight control conditions. • There is not viable technological alternative to cobalt acetate for its use as catalyst for PTA/DMT/PIA manufacture. Moreover, cobalt acetate is not chemically interchangeable with other cobalt salts. • Wrong decisions will waste regulatory resources and cause unjustifiable damage to European industry (unfair competition) , with a high socioeconomic impact. As a result of the above considerations, we consider that the criteria used by ECHA for the prioritisation are greatly overestimated. This means that the decision to propose cobalt diacetate for authorisation should be revisited in the light of the new information, and we propose exemption of authorisation for its use as catalyst for PTA/PIA/DMT manufacturing.
744	2011/09/12 11:24	Company France	The use of cobalt(II)diacetate in surface treatment doesn't meet the criteria of priorisation

740	2011/09/12 11:16	Please select organisation type.. Germany	Cobalt containing passivations are right now widely used to improve corrosion protection of zinc and zinc-alloy plated parts. Cobalt free passivations with similar of even improved corrosion protection are available and are also already used, so in our point of view there is no need for cobalt salts in the use of passivations.
732	2011/09/12 10:11	Company Spain	Our company NOVAPET S.A., located in Spain, produces PET resin. NOVAPET S.A. is a member of the Committee of PET Manufacturers in Europe (CPME) and fully agrees with the comments submitted by the CPME to this consultation. A-GENERAL COMMENTS TO BACKGROUND DOCUMENT. 1-Background information behind the proposal for Authorisation is incomplete and somewhat confused. 2-Some more time must be allowed for sound information to be made available before final decisions are made. Important regulatory decisions must be based on sound and well founded information. Wrong decisions will waste regulatory resources and cause unjustifiable damage to industry. 3-Current information shows that the ECHA prioritisation greatly overestimates concern. This means that the decision to propose cobalt diacetate for authorisation should be revisited in the light of the new information. 4-A balanced and informed reassessment is essential for the process to retain credibility. B-COMMENTS TO SPECIFIC PARTS OF BACKGROUND DOCUMENT. 2.1. Intrinsic properties. CPME accepts the classification of cobalt diacetate, pointing out that the carcinogenicity

			classification is restricted to exposure by the inhalation route. Virtually all cobalt diacetate used as a catalyst in terephthalic acid (PTA), isophthalic acid (IPA) and dimethylterephthalate (DMT) is handled as a solution in acetic acid which removes the risks of inhalation associated with handling the crystallised salt. There is a justifiable case for considering cobalt diacetate as a threshold carcinogen. As a carcinogen cobalt diacetate is handled in compliance with the Carcinogens Directive so that worker exposure is zero or minimal and it is used in closed systems. 2.2. Imports, exports, manufacture and uses. 2.2.1. Volume(s), imports/exports. Less than 450 tonnes of cobalt diacetate were used as catalyst in the manufacture of 3.9 million tonnes of PTA, IPA and DMT in Europe in 2011. 2.2.2. Manufacture and uses. 2.2.2.1. Manufacture and releases from manufacture. Not applicable to catalyst use. 2.2.2.2. Uses and releases from uses. Uses: •As a catalyst: Only cobalt diacetate is used as a catalyst in the production of PTA, IPA and DMT. Less than 450 tonnes of cobalt diacetate were used as catalyst in the manufacture of 3.9 million tonnes PTA, IPA and DMT in Europe in 2011. PTA, IPA and DMT are used as intermediates (monomers) in the manufacture of PET packaging resins, PET film and PET fibre. Most modern oxidation technologies use a highly effective cobalt catalyst recovery system so that release of and exposure to Cobalt is minimized. The use of cobalt acetate in the manufacture of PTA/IPA & DMT is carried out under strictly controlled conditions (SCC) in line with ECHA Guidance on Intermediates (Version 2 Dec

			2010). •Production of plastics and/or PET: There is no evidence that cobalt diacetate is used as a polymerisation catalyst in the EU PET sector. It is difficult to imagine that it would be used as such in the EU without the knowledge of CPME as this association represents 100% of the PET packaging resin producers in the EU. The use of Cobalt Diacetate as dye for tinting PET resin is currently being phased out. Volumes per sector or use: We understand that recent supply chain surveys have identified revised information about uses as follows: - Use as catalyst – 70-80% - Manufacture of Chemicals - 5% - Manufacture of Catalysts - < <1% - Use in organic pigments - <1% - Use surface treatments - <5% - Rubber adhesion - <<1% - Animal feed supplements - <1% - Use in PET – 10% A CPME survey shows that less than 450 tonnes of cobalt diacetate were used as catalyst in the manufacture of 3.9 million tonnes PTA, IPA and DMT in Europe in 2011. Releases from uses: As a member of CPME, NOVAPET S.A. does not recognise the high occupational exposure levels reported by the Netherlands and Germany as having any relevance to the use of cobalt diacetate in the manufacture of PTA, IPA and DMT. This sector constitutes the major use of cobalt diacetate in the EU In its catalyst use for PTA, IPA and DMT manufacture, cobalt diacetate is handled in closed process equipment under strictly controlled conditions. These operations are only carried out on specialised petrochemical industrial sites. Periodic air monitoring shows that airborne cobalt concentrations are below the level of detection and this is much lower than both the exposure data cited in the ECHA/Netherlands documentation and the REACH registration dossier.

			The residual levels of cobalt in the PTA product are <1ppm as cobalt. The metal is present as cobalt terephthalate which would be expected to be bound into the subsequently manufactured PET resin in a non soluble form. Resulting polymers are largely for food contact plastics use and therefore comply with the migration requirements of Regulation 2011/10/EU on plastic materials and articles intended to come into contact with food. 2.2.2.3. Geographical distribution and conclusions in terms of (organisation and communication in) supply chains. The use of cobalt diacetate as a catalyst in the manufacture of PTA, IPA and DMT takes place only at a small number of sites (9, with a further plant to open at the end of 2011) under strictly controlled conditions. This does not match the "high volume use" described in the draft background document. 2.3. Availability of information on alternatives. There is no suitable replacement for cobalt diacetate in the manufacture of PTA, IPA and DMT: - Cobalt diacetate has been used in the catalyst system since the manufacture of PTA, IPA and DMT began more than 50 years ago; - Every manufacturer worldwide of PTA, IPA and DMT uses Cobalt diacetate in their catalyst system; - Numerous research programmes have been run to find a suitable replacement for Cobalt diacetate – so far without success. Interchangeability of Cobalt Diacetate with the Carbonate, Chloride, Nitrate and Sulphate Salts. The other 4 proposed Cobalt salts cannot replace Cobalt Diacetate as a catalyst component in the manufacture of PTA, IPA and DMT: - The manufacturing process uses acetic acid as a solvent. - Chloride and Sulphate anions poison noble metal catalysts used in the manufacturing process. - Nitrates generate NOx off gasses. - Chloride ions attack the stainless steel plant. - Chloride ions also react to produce undesirable by-products. - Carbonates are insoluble solids and would need to be converted to acetates to

			become an active catalyst. - Using Carbonates would involve powder handling. On this basis there is no rationale for grouping the use of cobalt diacetate with other salts proposed for authorisation because there is no interchangeability. 2.4. Existing specific Community legislation relevant for possible exemption. All processes are industrial and operate under tightly controlled conditions which are equivalent to strictly controlled conditions (SCCs) for intermediates. Therefore, the potential for release or exposure is minimized. Risk management of the use of CoAc is already required and practised under: - The carcinogens directives 90/394/EC and 2004/37/EC on the protection of workers from the risks related to exposure to carcinogens or mutagens at work. - The Chemical Agents Directive, 98/24/CE. - Directive 2010/75/EU on industrial emissions (integrated pollution prevention and control). - Directive 96/82/EC on the control of major-accident hazards involving dangerous substances. - Regulation 2011/10/EU on plastic materials and articles intended to come into contact with food – CoAc is listed as a specific additive for food contact plastics. There is no consumer exposure to CoAc in any downstream product of PTA, IPA or DMT manufacture. 2.5. Any other relevant information (e.g. for priority setting). Important new data are available which indicate that the Prioritisation of cobalt diacetate must be revisited. 3. Conclusions and justification. 3.1. Prioritisation. Verbal-argumentative approach. Prioritisation. Important new data are available which indicate that the Prioritisation of cobalt diacetate must be revisited Verbal-argumentative approach: Given that the major use of cobalt diacetate (70-80%) is as a catalyst for the manufacture of PTA, IPA and DMT, that less than 500 tonnes/annum are used in this application, that the powder form is not handled and that these operations are carried out under strictly controlled conditions, cobalt diacetate is clearly not a high volume

			dispersive use substance as proposed. This use does not give rise to worker exposure. It is noted that in this catalyst application the substance is handled in the same manner as an intermediate under strictly controlled conditions but because it is a catalyst use and does not meet the REACH definition of an intermediate it is not exempt from authorisation as an intermediate would be. This suggests that disproportionate regulation is being applied to this catalyst use compared to an intermediate substance handled under the same strictly controlled conditions. Scoring Approach: The scoring approach needs to be revised to take account of the revised information available on cobalt diacetate. Using the ECHA scheme [General Approach for Prioritisation of Substances of Very High Concern (SVHCs) for Inclusion in the List of Substances Subject to Authorisation] a score can be derived as follows: - Intrinsic Properties (threshold carcinogen) - score 0 - Volume (100-1000 tes/a) - score 5 - Wide Dispersive Use 2 (10-100 sites) * 1 (non diffuse/controlled) = - score 2 TOTAL score = 7 This is in significant contrast to the ECHA proposal which derived a score of 16/17 based on incorrect inputs. Interestingly, even if all the non catalyst uses that are in scope for authorisation were seen collectively as being diffuse/uncontrolled/significant release and the substance was seen as a non-threshold carcinogen, the total score would only be 10. - Intrinsic Properties (assume non threshold carcinogen) score 1 - Volume (10 -100 tes/a) score 3 - Wide Dispersive Use 2 (10-100 sites) * 3 (diffuse/uncontrolled/signif) score 6 TOTAL score = 10 On this basis the Prioritisation that has been carried out on inappropriate data is flawed and the case for cobalt diacetate being subject to authorisation should be reconsidered. Furthermore if a tier II prioritisation process were applied [Consideration of relevant information regarding regulatory coherence and effectiveness] then it is clear that in the case of the major use (catalyst under strictly controlled conditions) it would be apparent that no significant regulatory benefit would accrue from applying Authorisation to the main use of

			cobalt diacetate C-COMMENTS ON COMMERCIAL ISSUES. Given no possibility of substitution if PTA production is no longer possible in Europe, European PET producers, even the ones that are integrated with their own PTA production, will be forced to buy outside Europe, with a potential competitive disadvantage (in terms of freight cost and negotiating power) compared to non EU producers that can supply on a local basis or are integrated with their own production. Some PTA EU producers might decide to relocate production facilities outside EU to avoid this fatal restriction, and then also PET producers to benefit from PTA integration, outside EU frontiers. Further, the amount of pX produced by European refineries could be no longer used for this application and will be diverted to fuels, increasing the aromatics content. - EU manufactured monomers will suffer a distinct financial disadvantage vs imported monomers in an industry that is already under considerable attack from import. - Downstream EU PET manufacturers may have the option to purchase potential cheaper imported monomers, based on this asymmetric regulatory conception, with consequent commercial effect on EU monomer manufacture. As a result, imported monomers, which utilise the same "CoAc as catalyst" may be potentially much more cost-advantaged, plus will BE EXEMPT from the Authorisation process, to which the EU manufacturers will be subject and have to comply with.
720	2011/09/10 17:54	Company Finland	INTRODUCTION The company manufacturers Cobalt diasetate in Finland and supplies this substance to customer's world wide. The substance was registered under REACH in 2010 The Company is also acting as Lead Registrant (LR) for this substance. We provided a response to the first consultation conducted for Cobalt diasetate in 2010 (SVHC proposal and Annex XV dossier by the Netherlands). The company is also a member of the Cobalt REACH Consortium Ltd (CoRC) together with 49 other members representing manufacturers and/or importers of cobalt substances. It should be highlighted that some downstream users are also members of the Cobalt REACH consortium. We fully supports the joint response comments provided by the Secretariat of the Cobalt REACH Consortium on the behalf of the Consortium member companies. As a coalition, the Cobalt REACH Consortium is in a better position to answer key questions on for instance volumes and usages for the substance.

			VOLUME(S) IMPORTS/EXPORTS (Section 2.2.1, page 1) As a company we do not have access to consolidated information on volumes manufactured /imported in EU or to EU nor to information corrected for export. Therefore we as a company are dependent on the information consolidated by the Secretariat of CoRC. Data on tonnages from registration information presented in the consultation document indicates a volume range of 1 000 – 10 000 t/y manufactured/imported in the EU. As a company we have reported our manufacturing volumes, export outsideof EU and sales within EU and therefore we rely on information provided by the CoRC. According to the Secretariat of CoRC the total tonnage of cobalt diacetate on the EU market (corrected for export) is between 100 and 1 000 tonnes per year. MANUFACTURE AND RELEASES FROM MANUFACTURE (Section 2.2.2.1, page 2) Release from Manufacture: Our manufacturing operations are located in Finland. The release into the environment is regulated by national environmental permits which include e.g. limit values for cobalt released into the sea and air, emission monitoring programs, evaluation on best available technique (BAT) and reporting to the authorities on an monthly and yearly basis. It should be highlighted that the environmental permit is not only demanding emission control but also the monitoring of any potential impact on the environment. Exposure: Exposure information included in the ECHA document is not specific to Cobalt diasetate and in addition it would be proper to present information originating from EU countries. As an manufacturer we are following national TWA limits for workers, which in Finland is 0,05 mg/m3 for Cobalt. Regular occupational exposure measurements are conducted including both stationary and personal sampling. Measurements are also conducted based on workers job description. Because of it's classification as carcinogen and toxic for reproduction (1B), manufacturing areas are marked with CMR-signs, and workers in potential contact with the substance are reported annually to a national ASA-register. Based on the aforementioned, an effective exposure control can be demonstrated and can be considered safe use. As a manufacturer and registration of Cobalt diasetate we provided together with the registration dossier a comprehensive assessment, which incorporate both the inherent exposure potential of a use in combination with recommended risk management measures. All registered uses of cobalt diasetate can demonstrate effective control of exposure and can be considered safe uses. As the registration dossier contains exposure scenarios for all identified uses of cobalt

			diasetate, these scenarios should be used in preference to the historic or literature values currently quoted in the background document that could be relevant to uses that are not supported under REACH or are not consistent with the exposure scenarios established for cobalt diasetate. USES AND RELEASES FROM USES (Section 2.2.2.2, pages 2 to 4) It would be beneficial to indicate uses subjected and not subjected to authorization in this section. This would give the public an overview of these and help them to take part in the public consultation. To the best of our knowledge the following uses can be considered as intermediates and should be exempt from authorization: • Manufacturing of cobalt diasetate • Industrial use of cobalt diacetate in the manufacture of inorganic pigments & frits, glass and ceramic ware • Industrial use of cobalt diacetate in the manufacture of other chemicals • Manufacture of catalyst • Industrial use of cobalt diacetate in surface treatment processes (intermediate use) • Industrial use of cobalt diasetate in the manufacturing of hardmetal powder (Cobalt-Tungsten carbide powder) Use of cobalt diacetate as an catalyst for manufacturing of terephthalic acid (PTA), dimethyl terephthalate (DMT), isophthalic acid (IPA) is to our understanding already tightly controlled by existing legislation and should therefore be treated in a comparable way to other chemical intermediates i.e. exempted from REACH. The animal feed usage sector is exempted under REACH. Reach Regulation No 1907/2006, Article 2: The provisions of Titles II (REGISTRATION OF SUBSTANCES), V (DOWNSTREAM USERS), VI (EVALUATION) and VII (AUTHORISATION) shall not apply to the extent that a substance is used: (b) in food or feeding stuffs in accordance with Regulation (EC) No 178/2002 including use: (iii) as an additive in feeding stuffs within the scope of Regulation (EC) No 1831/2003 of the European Parliament and of the Council of 22 September 2003 on additives for use in animal nutrition (9). However authorization dossiers are required according to the EU regulation on additives for use in animal nutrition (1831/2003). Authorization dossiers have been made for cobalt sulphate, cobalt carbonate and cobalt diasetate according to 1831/2003. These dossiers contain in section III information on safety of the additive

			• Risks for Workers who manufacture the cobalt salt • Workers who use cobalt salt for preparing premixtures • Users of premixtures • Risk for target species • Risk for consumers • Risk for environment It would be proper to indicate this in the consultation document so that the public would have information that this usage is already covered by another EU regulation than REACH. AVAILABILITY OF INFORMATION ON ALTERNATIVES (Section 2.3, page 6) It is not reasonable to assume that other cobalt salts could replace cobalt diacetate for most of its applications. One example is to our understanding the industrial use of Cobalt diasetate as a catalyst for manufacturing of terephthalic acid (PTA), dimethyl terephthalate (DMT) and isophthalic acid (IPA). The reactions are carried out in acetic acid media and by using Cobalt diasetate it is possible to prevent contaminations from other anions and cations. Even if the salt could be substituted chemically, there would be a number of practical considerations to take into account. No interchangeability would be possible without considerable development work and costs to switch from cobalt diasetate to another salt. EXISTING SPECIFIC COMMUNITY LEGISLATION RELEVANT FOR POSSIBLE EXEMPTION (Section 2.4, page 6) The use of cobalt diacetate as an animal feed supplement would fall within the scope of feed safety regulation (EC 178/2002). The use of cobalt diasetate in animal nutrition would fall within the scope of EU regulation 1831/2003. The Carcinogens Directive (90/394/EEC), Directive 98/24/CE, Directive 2004/37/CE all apply to CMR compounds. Risk management is already required by existing legislation as for example the carcinogens at work directive (Dir. 2004/37/EC) and the IPPC directive (Dir. 2008/1/EC). PRIORITISATION (Section 3.1, page 6) The data in the registration dossier and updates to be submitted by the end of this year indicate that cobalt diacetate is non genotoxic in vivo, suggesting a threshold mode of action. Several of the identified uses are exempt from Authorisation. In case for any uses that are not exempt, risk management is already required by existing legislation for example the

			carcinogens at work directive (Dir. 2004/37/EC and the IPPC directive (Dir. 2008/1/EC). Therefore, the company does not believe that cobalt diacetate should be prioritized for inclusion on Annex XIV. REFERENCES (Section 4, page 7) It was not possible to make proper assessment or comments on this section because the internet link was not working.
716	2011/09/10 11:59 File attached	Adolf Krämer Metallveredlung GmbH & Co KG Company Germany	We made surface technologie for automotive, windcraft, solar and so on. For high corrosion resistance in off shore or winter geographic lands we need Cobalt for the corrosion resistance. Without cobalt and Cr-VI you´ve got a ressistance from minus 90%! For us means we lost round about 70 peoples and 8 Mio € turn around.

691	2011/09/09 15:01	Company Germany	1 Präambel Die Galvano- und Oberflächentechnik ist eine wichtige Schlüssel- und Querschnitts-Technologie und damit einer der Motoren des technischen Fortschritts. Innerhalb der Galvanotechnik bilden Zink und Zinklegierungen mit nachfolgenden Konversionsschichten für den kathodischen Korrosionsschutz von Stahlbauteilen einen besonderen Schwerpunkt mit wachsender Bedeutung. Generell kann gesagt werden, dass Zink/Zinklegierungen optimalen Korrosionsschutz mit geringstem Materialeinsatz und niedrigen Kosten ermöglichen. Wesentlicher Bestandteil des Schutzsystems ist eine Konversionsschicht, die als Nachbehandlung der metallischen Zink bzw. Zinklegierungsschicht auf deren Oberfläche erzeugt wird. 2 Allgemeines Bei diesem chemischen Verfahren werden die verzinkten Bauteile in eine Behandlungslösung, die dreiwertige Chrom-Verbindungen enthält, eingetaucht. Die Lösungen reagieren chemisch mit der Metalloberfläche und erzeugen dünne, ca. 30 bis 1.000 Nanometer (nm) starke Umwandlungsschichten, die sogenannten Konversionsschichten. Die Langlebigkeit von Bauteilen hängt in sehr starkem Maße von der zusätzlichen Korrosionsschutzwirkung der Konversionsschicht ab. Die Konversionsschichten verzögern den Erstangriff auf die metallische Schutzschicht aus Zink bzw. Zinklegierung. Sie werden aus diesem Grunde überwiegend zur Erhöhung der Korrosionsbeständigkeit z.B. von verzinkten Bauteilen im Automobil angewendet. Weitere Einsatzzwecke sind u.a. Verbesserung der Haftfestigkeit anschließend aufgebrachter Lackschichten. Chemische Verfahren zur Erzeugung von Konversionsschichten basierend auf dreiwertigen Chromverbindungen Es sind schon seit geraumer Zeit Lösungen, basierend auf dreiwertigen Chrom¬verbindungen, zur Erzeugung von Konversionsschichten im Einsatz. Diese Lösungen enthalten weiterhin Neutralsalze, die zum Teil auch im Lebensmittelbereich Anwendung finden. Hier sind u.a. Natriumfluorid (Zahnpasta) und Natriumnitrat (Pökelsalz) zu nennen. Die eingesetzten dreiwertigen Chromverbindungen bilden mit den Neutralsalzen Komplexe und reagieren mit der Metalloberfläche des eingetauchten Bauteils. Auf diesem Wege entstehen geeignete Chrom(VI)-freie Konversionsschichten. Es zeigt sich, dass Cr(III)-basierte Passivierungen nur dann mit hohem Korrosionsschutz möglich sind, wenn den Applikationslösungen Kobaltsalze zugesetzt werden und Kobalt mit < 2 % bezogen auf die Konversionsschicht in diese einlagert wird. Der Zusatz von Kabaltsalzen ist insbesondere erforderlich, wenn der Korrosionsschutz auch in warmen bzw.

			heißen Umgebungen gefordert ist (Motorraum, Bremsen, Getriebe usw. sowie Elektroteile in Gehäusen usw.). Hier sind kobalthaltige Lösungen Stand der Technik und bisher für reine Zinkschichten und Zink-Eisen-Legierungen unverzichtbar. Konversionsschichten mit einer Schichtsicke von ca. 0,2 - 1 µm werden als Dick¬schicht¬passivierung („DISP") bezeichnet. Die Anforderungen für einen beherrschten Prozess zur Erzeugung dieser Schichten sind deutlich höher als bei den bisherigen Chromatierschichten. Grundsätzlich müssen bei dreiwertigen Chromsalz-Passivierungen folgende Parameter in engen Toleranzen eingehalten werden: ☐ Konzentration der Hauptbestandteile (z.B. Cr-III und Co-II) ☐ pH-Wert ☐ Temperatur ☐ Fremdmetallkonzentration (insbesondere Eisen) ☐ Art und Umfang der Elektrolytkonvektion Nachträglich auf die DISP-Schicht aufgebrachte Versiegelungen oder TopCoats versehen die beschichtete Oberfläche mit einer zusätzlichen Diffusionsbarriere und verstärken den Korrosionsschutz dieser alternativen Systeme. Anzumerken ist, dass nachträglich aufgebrachte Versiegelungen/TopCoats das Korrosionsverhalten auch der konventionellen Systeme mit sechswertigen Chrom-Verbindungen erhöhen. 3 Mögliche Gesundheitsgefahren bei Einwirkung von Kobalt(II)-salzen Risiken bei der Anwendung von Passivierungs-Konzentraten, die Kobalt-II-Salze enthalten Die Kobaltsalze werden nicht unmittelbar als Feststoff zur Erzeugung der Kon¬ver¬sionsschicht angewendet, sondern bei Herstellung der Passivierungslösung in Lösung gebracht. Bei den angelegten pH-Werten zerfällt das Kobaltsalz in wassergelöste Co-Ionen und andere Bestandteile. Somit ist ein unmittelbarer Umgang des Personals der Anwender mit Co-Salzen bei dieser Verwendung nicht gegeben; eine sichere Verwen¬dung ist gegeben. Die Kobalthaltige Passivierungslösung wird bei Raumtemperatur und rein chemisch betrieben. Somit ist bei durch den Endanwender entsprechend geprüften Absaugungen an den Anlagen eine Belastung der Luft durch kobalthaltige Aerosole weit unterhalb bekannter gesetzlicher Grenzwerte (Vgl. unten, 3.2.1). Eine sichere Verwendung ist gegeben. Kobaltsalze werden als solche nicht in die Passivierungsschicht einge¬baut, sondern bei der Konversions¬reaktion in Hydroxidverbindungen umge¬wandelt. Auch in den Kon¬ver¬sionsschichten liegen also die Kobaltsalze nicht vor und können keine negativen Aus¬wirkungen auf Mensch oder Umwelt ausüben.

			Risiken bei der Herstellung von Passivierungs-Konzentraten, die Kobalt-II-Salze enthalten Bei der Herstellung der Konzentrate, die beim Anwender zum Betrieb einer Passivierungslösung verwendet werden, kann es kann es bei Nichtbeachtung der in der Fertigungsvorschrift vorliegenden Sicherheitshinweise bzw. Vorschriften zu einer Exposition mit Co-Salzen in Form atembarer Stäube, Aerosole oder durch Hautkontakt kommen. Akute Toxizität, dermal: Werte für eine Aufnahme löslicher Kobaltsalze über die Haut liegen nicht vor, eine sensibilisierende Wirkung auf die Haut wird aber vermutet. Akute Toxizität, Inhalation Werte zur akuten Toxizität von löslichen Kobaltverbindungen durch Inhalation liegen nicht vor. Aus zweijährigen Studien an Ratten besteht jedoch der Verdacht einer chronischen Toxizität mit Schädigung der Atmungsorgane. Bewertung der Messwerte Eine gesundheitliche Schädigung durch unbeabsichtigte orale Aufnahme löslicher Kobaltsalze besteht nicht. In Bereichen, wo mit Kobaltsalzen oder kobaltsalzhaltigen Gemischen gearbeitet wird, besteht ein striktes Verbot der Aufnahme von Lebensmitteln und striktes Rauchverbot. Eine unbeabsichtigte Aufnahme kann daher ausgeschlossen werden. Eine Sensibilisierung der Haut kann ebenfalls ausgeschlossen werden. Hier besteht ein ausreichender Schutz durch Anlegen von persönlicher Schutzausrüstung (Handschuhe, Schutzkleidung). Der Arbeitgeber ist verpflichtet, die Einhaltung der Verpflichtung zum Tragen persönlicher Schutzausrüstung zu kontrollieren. Die mögliche Gefährdung durch Einatmen von kobaltsalzhaltigen Aerosolen oder Partikeln wird anlagentechnisch durch geeignete Absauganlagen verhindert. Die Wirksamkeit dieser Schutzmaßnahmen wird durch regelmäßige Arbeitsplatzmessungen durch die technischen Aufsichtsdienste der Berufsgenossenschaften kontrolliert. Bei einer Messung, die 2004 in einem Betrieb durchgeführt wurde, der eine kobaltsulfathaltige Passivierung zur

			Passivierung von galvanisch abgeschiedenen Zinkschichten im Einsatz hat, wurde an mehreren Messstellen im Betrieb gemessen. Die Ergebnisse waren wie folgt: Messplatz Messwert Kobalt 1 < 1 mg/L gefällt werden. Derzeit gibt es für Galvaniken und diesen Parameter noch keinen Grenzwert in der AbwV bzw. im Anhang 40 zu dieser Verordnung. 5 Wirtschaftliche Bedeutung von Passivierungs- und Konversionsschichten auf Zink und Zinklegierungen 5.1 Wirtschaftliche Bedeutung der Beschichtungsbetriebe für Europa und für Deutschland Der Absatz von Passivierungen (Chrom(III)-basiert) für die galvanische Verzinkung in Europa beträgt etwa 40 Millionen Euro, davon etwa 16 Millionen € in Deutschland. Dies entspricht einem Kosten- bzw. Umsatzanteil von etwa 2,5 % bei den Galvanisierbetrieben, die Zinkbeschichtungen ausführen. Daraus errechnet sich ein Fertigungsvolumen bei den Beschichtungsbetrieben von europaweit etwa: 1.600 Millionen Euro. Der umsatzmäßige Anteil von Cr(III)- basierten Passivierungen beträgt etwa 95% des Marktsegments Konversionsschichten für Zink- und Zinklegierungsschichten. Die europaweite Wertschöpfung von etwa 1.600 Millionen Euro, die durch Betriebe der galvanischen Verzinkung generiert wird, ist bei einem Verwendungsverbot von Kobaltsalzen in Europa direkt betroffen. • Der Anteil an Kobalt-relevanten Anwendungen beträgt etwa 75% = 1.200 Mio Euro Die Restsumme von etwa 320 Mio € wird mit schon jetzt mit Kobaltfreien Schichten generiert, die aber in der Regel auf einem niedrigeren Qualitätsniveau liegen. Außerdem wird dieses Segment in denselben Anlagen beschichtet wie die übrige Ware. Ein Wegfall des überwiegenden Mengenanfalls führt daher zu drastisch steigenden Fixkosten-Umlagen. Die Restproduktion ist nicht mehr wirtschaftlich zu betreiben; die betroffenen Betriebe müssten schließen. Der Fertigungsanteil deutscher Betriebe am europäischen Markt beträgt etwa 40%. Das Fertigungsvolumen der Verzinkungsbetriebe beträgt damit für Deutschland etwa 640 Millionen Euro. Davon beträgt • der Anteil an Kobalt-relevanten Anwendungen etwa 75% = 480 Mio Euro 5.2 Gesamtwirtschaftliche Bedeutung der Konversionsbeschichtung

			5.2.1 Beispiel Automobilindustrie in Deutschland Ein Umsatzanteil von etwa 45 % der von Verzinkungsbetrieben beschichteten Bauteile geht in die Automobilindustrie, z.B. für Gehäuse, Befestigungsschienen, Bremsenteile, Rohrleitungen, Sicherheitsschellen, Getriebe- und Stossdämpferkappen, Kraftstoffpumpen, Schrauben, usw. Laut VDA (Stand 25.03.2011) wurden in 2010 in Deutschland 5.552.409 PKW gebaut sowie 353.576 Nutzfahrzeuge. Bei einem Durchschnittverkaufspreis von in Deutschland hergestellten PKW von ca. 25.000 € (Annahme VDA) ergibt sich damit ein Fertigungsumfang von 140 Milliarden € allein in der deutschen Automobilindustrie, der zur Sicherstellung von Langlebigkeit und Funktionssicherheit zahlreiche verzinkte Bauteile erfordert (geschätzt: etwa 500 -1.000 Bauteile mit Konversionsbeschichtung auf Zink bzw. Zinklegierung pro Fahrzeug). Wenn der finanzielle Rahmen nicht berücksichtigt wird und nur die für den Automobilbau in Deutschland veredelten Artikel mit >500 Teilen pro Pkw berechnet werden, bedeutete dieses, dass ohne die Veredlung mit galvanischen Zinkbeschichtungsprozessen mehr als 2,8 Milliarden Teile pro Jahr nicht mehr in den Galvaniken bearbeitet würden. 5.2.2 Beispiel Fensterbeschlaghersteller Ein Umsatzanteil von etwa 20 % der von Verzinkungsbetrieben beschichteten Bauteile geht in die Herstellung von Beschlägen für den Fensterbau. Der Gesamtbedarf an Produkten für die galvanische Oberflächenveredlung beträgt in Europa etwa 25 Mio Euro pro Jahr, davon etwa 8 Mio € für kobalthaltige Passivierungen. Der überwiegende Teil der Beschichtungen wird in Deutschland, Frankreich und Österreich ausgeführt. Die galvanische Veredlung trägt mit einem Umsatzanteil von etwa 100 Mio Euro pro Jahr zum europäischen Sozialprodukt bei bewirkt durch einen hohen Anteil manueller Arbeit gesicherte Arbeitsplätze für etwa 3.000 Menschen. Insgesamt generieren die europäischen Hersteller von Fenster- und Türbeschlägen einen Jahresumsatz von etwa 3.000 – 4.000 Mio € und beschäftigen etwa 16.000 – 20.00 Mitarbeiter. Der hohe Schutzwert der galvanisch beschichteten Bauteile trägt maßgeblich zur Langlebigkeit der hergestellten Wirtschaftsgüter, insbesondere der Fenster, bei. Ein Verbot des Einsatzes von Kobaltsalzen in Passivierungen würde den Korrosionsschutz der beschichteten Teile deutlich vermindern und damit negative Auswirkungen auf die Langlebigkeit und Nachhaltigkeit des industriellen Wirtschaftens in Europa haben. Verstärkter Rohstoffeinsatz und zusätzlicher Energieverbrauch wäre die Folge und würde die europäischen Klimaschutzziele und Senkungsbestrebungen zum CO2 Ausstoß belasten. ZUSAMMENFASSUNG

			Unverzichtbare Eigenschaft beschichteter Stahlteile, die in allen Bereichen von Industrie, Gewerbe und auch im Haushalt zum Einsatz kommen, ist der kathodische Korrosionsschutz mittels Zink und Zinklegierungsschichten, der durch Konversionsschichten verstärkt wird. Es ist und bleibt ständige Aufgabe der galvanotechnischen Industrie, mit neuen und/oder verbesserten Beschichtungsprozessen die Funktionalität und Langlebigkeit der Produkte zu gewährleisten. Gleichzeitig werden durch Regeneration der Prozesslösungen die Standzeiten verlängert, der Energie- und Stoffeinsatz vermindert und damit die Umwelt entlastet. Kobaltfreie Dickschichtpassivierung für Zink und Zink-Eisen-Legierungen sind derzeit in der Entwicklung. Hier ist noch eine umfangreiche Erprobung durch die Galvanisierbetriebe erforderlich; Optimierungen und Anpassungen in der Applikationstechnik müssen erarbeitet werden. Darüber hinaus ist die Laborerprobung der Schichten sowie die Funktionsprüfung und Felderprobung durch die Endnutzer erforderlich, um die Schichteigenschaften im realen Praxiseinsatz zu ermitteln, zu erproben und sicherzustellen. In weiten Bereichen sind Sicherheitsaspekte zu berücksichtigen. Wir gehen davon aus, dass eine breite Feldanwendung etwa 6 – 8 Jahre Vorlaufzeit erfordert. Daher sind für eine Beschränkung der Verwendung von Kobaltsalzen lange Übergangszeiten erforderlich sowie eine generelle Ausnahme für die Verwendung zur Herstellung von Bauteilen bestehender Serien, wie sie ja auch bei der ELV-Verordnung eingeräumt wurde. Wir fordern eine Ausnahmeregelung für die Verwendung von Kobaltsalzen (Kobalt(II)-dinitrat, Kobalt-dichlorid, Kobalt(II)-sulfat, Kobalt(II)-diacetat, Kobalt(II)-carbonat) in Lösungen zur Erzeugung von Konversionsschichten im Falle einer Aufnahme dieser Stoffe in den Anhang XIV der REACh-Verordnung.

686	2011/09/09 14:47 File attached	 Company Germany	
679	2011/09/09 13:25	Lotte Chemical UK Ltd Company United Kingdom	GENERAL COMMENTS Lotte Chemical UK Ltd (LCUK) is an integrated PTA/PET manufacturer and a member of the CPME. As a member we contributed information which was used to provide comments on the Netherlands proposal for Authorisation. We agree with the CPME's comments made previously and those submitted on the draft recommendation for inclusion of cobalt acetate in Annex XIV. The background information behind the Netherlands proposal for authorisation is incomplete and not always clear. Any regulatory decisions should be based on accurate information, as any wrong decisions would cause unprecedented damage to the manufacturing industries within the EU. Before any final decisions are made on the authorisation of cobalt diacetate, new information should be taken into account and sufficient time allowed for accurate, well informed information to be presented. Only with a balanced and correctly informed reassessment on the Authorisation of Cobalt diacetate will the process be seen to be representative of the true risks involved. If cobalt diacetate is added to Annex XIV, with the possibility that PTA production ceases in Europe, then European PET manufacturers would be forced to buy outside Europe. As an integrated PTA/PET manufacturer LCUK, along with other European producers, will suffer a huge competitive, financial and operational disadvantage compared to non EU producers with their own local PTA supplies. The domino effect of this competitive disadvantage may be plant closures and relocation of companies outside the EU, which impacts on their suppliers .The PET market is already

			under threat from imports, and EU manufactured monomers will suffer significant financial disadvantages verses imported monomers. Imported monomers, although using the same cobalt diacetate based catalyst that EU manufacturers use, will be much more cost advantaged and will also be exempt from the authorisation process. EU manufacturers will have to comply with the authorisation process even though they utilise the same process catalyst as the non EU producers. 2.1. Intrinsic properties Cobalt(II) diacetate was identified as a Substance of Very High Concern (SVHC) according to Articles 57(a) and (c) as it is classified according to Annex VI, part 3,Table 3.1 of Regulation (EC) No 1272/2008 as a carcinogen category 1B1, H350i (may cause cancer by inhalation), and as toxic for reproduction category 1B1, H360F (may damage fertility), and was therefore included in the candidate list for authorisation on 15 December 2010, following ECHA's decision ED/95/2010. Using LCUK's knowledge of the PTA business, the majority of cobalt diacetate oxidation catalyst is used in an acetic acid solution, normally remains in a closed system and the solid crystals are not isolated during manufacture. As the carcinogenicity classification of cobalt diacetate is restricted to exposure by inhalation, the above use in PTA manufacture removes the risk of inhalation exposure due to fines of solid cobalt diacetate. There is no exposure to downstream users of the PTA Cobalt diacetate is handled in a way which complies with the Carcinogen Directive which ensures that worker exposure is zero or close to minimal and it is used in a closed system where possible. 2.2. Imports, exports, manufacture and uses 2.2.1. Volume(s), imports/exports According to registration information the volume manufactured/imported in the EU is in the range of 1,000 – 10,000 t/y. On the basis of tonnages reported to the Cobalt REACH Consortium (CoRC; personal communication with EUROMETAUX, 2011), the annual production in the EU, corrected for export, was estimated below 1,000 t/y. Less than 450 tonnes of cobalt diacetate were used as catalyst in the manufacture of 3.9 million tonnes of PTA, IPA and DMT in Europe in 2011 2.2.2. Manufacture and uses 2.2.2.1. Manufacture and releases from manufacture – not applicable to catalyst use 2.2.2.2. Uses and releases from uses

			Uses According to Registration data (additional info from other sources as mentioned below), cobalt(II) diacetate is used in the EU in: • As a catalyst: As stated in the Annex XV Dossier, by far the main use of cobalt(II) diacetate is as a catalyst in the production of PTA, which is an intermediate for the manufacture of polyester fibres. Furthermore (the Netherlands, 2010; RCOM, 2010), cobalt(II) carboxylates, such as the oleate, acetate, and naphthenate, are used in the liquid-phase oxidations of p-xylene to terephthalic acid, cyclohexane to adipic acid, acetaldehyde to acetic acid, and cumene to cumene hydroperoxide. These reactions each involve a free-radical mechanism. Cobalt-catalyzed oxidations form the largest group of homogenous liquid phase oxidations in the chemical industry. According to additional information received during consultation (RCOM, 2010), cobalt(II) diacetate is used as a catalyst for the production of Dimethyl terephthalate (DMT). It is only used in the form of aqueous solution. During the DMT production process cobalt(II) diacetate is only lost within the esterification process resulting to metallic cobalt, which is recycled via extraction. DMT is purified by a distillation process. Only cobalt diacetate is used as a catalyst in the production of PTA, IPA and DMT Less than 450 tonnes of cobalt diacetate were used as catalyst in the manufacture of 3.9 million tonnes PTA, IPA and DMT in Europe in 2011. PTA, IPA and DMT are used as intermediates (monomers) in the manufacture of PET packaging resins, PET film and PET fibre. Most modern oxidation technologies use a highly effective cobalt catalyst recovery system so that release of and exposure to Cobalt is minimized. The use of cobalt acetate in the manufacture of PTA/IPA & DMT is carried out under strictly controlled conditions (SCC) in line with ECHA Guidance on Intermediates, Version 2 Dec 2010 • Production of plastics and/or PET: Cobalt(II) diacetate is used as catalyst for resin polymerisation. The final handling of PET articles has been registered as use by industrial, but as well as professional workers. Furthermore, cobalt(II) diacetate is used as a dye for tinting clear PET bottles a light blue colour (the Netherlands, 2010). The use in PET tinting though is potentially soon to be phased out, according to information from the Committee of PET manufacturers in Europe (RCOM, 2010). Moreover, regarding the reference in the Annex XV dossier on the use of the substance as a catalyst in the manufacture of PET monomer, doubts were expressed during the stakeholder consultation by the Committee of PET manufacturers in Europe (RCOM,

			2010). LCUK agrees with the CPME that there is no evidence that cobalt diacetate is used as a polymerisation catalyst in the EU PET sector. It is difficult to imagine that it would be used as such in the EU without the knowledge of CPME as this association represents 100% of the PET packaging resin producers in the EU. Volumes per sector or use According to information collected by the Cobalt REACH Consortium (the Netherlands, 20103; RCOM, 2010): _ more than 70% of the cobalt(II) diacetate in the EU is used in the manufacture of catalysts – though, according to the information from the stakeholder consultation, a significant part of this amount may relate to the use of the substance itself as a catalyst, corresponding to at least several hundred tonnes per year. _ up to 15% is used in the manufacture of chemicals (feed materials for other chemicals), _ up to 10% is used in surface treatment (anodizing) and alloys (hard metal) _ up to 5% is used in the production of pigments (ceramics, anodizing), dyes, and rubber adhesion _ up to 5% is used as animal food supplement We understand that recent supply chain surveys have identified revised information about uses as follows : Use as catalyst – 70-80% Manufacture of Chemicals - 5% Manufacture of Catalysts - < <1% Use in organic pigments - <1% Use surface treatments - <5% Rubber adhesion - <<1% Animal feed supplements - <1% Use in PET – 10% A CPME survey shows that less than 450 tonnes of cobalt diacetate were used as catalyst in the manufacture of 3.9 million tonnes PTA, IPA and DMT in Europe in 2011. Releases from uses The main route of occupational exposure of cobalt compounds is via the respiratory tract by inhalation of dusts, fumes and mists containing cobalt (IARC 1991 in RCOM, 2010). According to its classification, Cobalt(II) diacetate may cause cancer by inhalation, with a low specific concentration limit of 0.01% for this hazard (it is noted that cobalt(II) diacetate is also classified as toxic for reproduction).

			Some measured concentrations have been reported in the literature for the dust in facilities producing cobalt salts (0.05–50 mg cobalt /m3), and in a refinery (relating to cobalt salts use - 68 – 89 µg/m3; range 1 – 7700 µg/m3) (the Netherlands, 2010; RCOM, 2010). The Cobalt REACH Consortium highlighted during the public consultation on the identification of the substance as SVHC that further exposure data is available, as having been provided to the Consortium Consultants, and which were considered in the detailed Exposure Scenarios that prepared for the Registration Dossiers for cobalt salts. According to Germany, on the basis of toxicological and exposure data in the open literature the occupational cancer risk is expected to be high (ROCM, 2010). As regards consumer exposure, in a relevant study on porcelain dinnerware from Europe and Asia, which had been manufactured before mid-1970s and had hand painted designs over the glaze, the extracted Co under acidic conditions was from <0.020 to 2.9 µg/mL (Sheets 1998 and ASTDR 2004 in the Netherlands, 2010). Cobalt diacetate catalyst for PTA manufacture is handled as a solution in a closed process system with strict operational controls where inhalation exposure is unlikely to occur. The cobalt is recovered from the process which minimises addition of new cobalt solution. The residual content of cobalt in the PTA is present as cobalt terephthalate at levels less than 1ppm. These very low levels of cobalt stay within the PTA and are subsequently incorporated into the PET resin in a non-soluble form. The PET resin is mainly used in articles intended to come into contact with food and must comply with the migration limits in Regulation 10/2011/EU. Airborne cobalt concentrations are periodically monitored and show that concentrations are much lower than exposure data cited in the ECHA/Netherlands documentation and the REACH registration dossier DNEL (40ug/m3). LCUK do not recognise the high occupational exposure levels reported by Netherlands and Germany as having any relevance to the use of cobalt diacetate in the manufacture of PTA, IPA and DMT. This sector constitutes the major use of cobalt diacetate in the EU 2.2.2.3. Geographical distribution and conclusions in terms of (organisation and communication in) supply chains Estimates on the number of downstream users of cobalt(II) diacetate in the EU have been provided for combined use categories by the Cobalt REACH Consortium (CoRC; the Netherlands, 2010). According to these data (some double-counting may exist, according to CoRC), aprox. 10–15 downstream users relate to the manufacture of catalysts, 5-10 users in the production of other chemicals, 10-15 users involved in surface treatment and alloys, 10–15 in the production of pigments, dyes, and adhesion, and less than 10 sites are

			estimated to be involved in applications relating to animal food supplements. As mentioned above, it is further expected that a larger number of sites are involved in the use of the substance itself as a catalyst. Based on the available information and the registered uses, it can be concluded, in particular for uses in the scope of authorisation, that the supply chains contain a relatively small number of EU manufacturers and importers, a medium number of downstream users, which represent a medium number of industry branches. In conclusion, according to the available information, the supply chains for cobalt(II) diacetate appear to be of medium complexity. The supply chain when cobalt diacetate is used as a catalyst in the manufacture of PTA, IPA and DMT is simple: manufacture, distributor/importer, end user. There are a limited number of big plants in Europe using cobalt diacetate under strictly controlled conditions, therefore the use is not widespread. 2.3. Availability of information on alternatives As for cobalt(II) diacetate and other cobalt salts a number of common uses have been registered, it can be reasonably assumed that such salts could in general replace cobalt(II) diacetate in some of its applications. According to the Cobalt REACH Consortium, the vast majority of the applications do actually not allow for mutual substitution of the cobalt salts for technical and/or economical reasons; even where it is chemically feasible to substitute the cobalt salts, it would not be practical on an industrial scale without involving excessive cost (further information is currently collected for the current applications; personal communication with EUROMETAUX, 2011). According to industry comments (RCOM, 2010), unlikely / no viable alternatives are identified for the function as catalyst in various applications, while it is mentioned that available solutions exist and are currently being implemented for the use of cobalt(II) diacetate as colour modifier for PET materials. There is no suitable replacement for cobalt diacetate in the manufacture of PTA, IPA and DMT: • Cobalt diacetate has been used in the catalyst system since the manufacture of PTA, IPA and DMT began more than 50 years ago; • Every manufacturer of PTA, IPA and DMT worldwide uses Cobalt diacetate in their catalyst system; • Numerous research programmes have been run to find a suitable replacement for Cobalt diacetate – so far without success.

			Interchangeability of Cobalt Diacetate with the Carbonate, Chloride, Nitrate and Sulphate Salts The other 4 proposed Cobalt salts CANNOT replace Cobalt Diacetate as a catalyst component in the manufacture of PTA, IPA and DMT. • The manufacturing process uses acetic acid as a solvent; • Chloride and Sulphate anions poison noble metal catalysts used in the manufacturing process; • Nitrates generate NOx off gasses; • Chloride ions attack the stainless steel plant; • Chloride ions also react to produce undesirable by-products; • Carbonates are insoluble solids and would need to be converted to acetates to become an active catalyst; • Using Carbonates would involve powder handling. On this basis there is no rationale for grouping the use of cobalt diacetate with other salts proposed for authorisation because there is NO interchangeability 2.4. Existing specific Community legislation relevant for possible exemption No data available. All processes are industrial and operate under tightly controlled conditions which are equivalent to strictly controlled conditions (SCCs) for intermediates. Therefore, the potential for release or exposure is minimized. Risk management of the use of CoAc is already required and practised under:- • The carcinogens directives - 90/394/EC and 2004/37/EC on the protection of workers from the risks related to exposure to carcinogens or mutagens at work; • The Chemical Agents Directive, 98/24/CE; • Directive 2010/75/EU on industrial emissions (integrated pollution prevention and control); • Directive 96/82/EC on the control of major-accident hazards involving dangerous substances; • Regulation 2011/10/EU on plastic materials and articles intended to come into contact with food – CoAc is listed as a specific additive for food contact plastics. There is no consumer exposure to CoAc in any downstream product of PTA, IPA or DMT manufacture. 2.5. Any other relevant information (e.g. for priority setting) No data available. See comments on Prioritisation below. Important new data are available which indicate

			that the Prioritisation of cobalt diacetate must be revisited 3. Conclusions and justification 3.1. Prioritisation Verbal-argumentative approach High volume used in the scope of authorisation. Widespread uses, as it appears that the substance is used at a high number of industrial settings and that the number of workers/ professional users involved might also be high. • Releases at workplaces in industrial settings seem to be controlled in most cases but some processes, involving handling of powder forms of the substance have a potentially significant exposure potential for industrial and - where relevant - professional workers. Therefore, based on the criteria, the substance gets high priority. Prioritisation Important new data are available which indicate that the Prioritisation of cobalt diacetate must be revisited Low volume usage – less than 450 tonnes of cobalt diacetate used as a catalyst in 2011 The supply chain when cobalt diacetate is used as a catalyst in the manufacture of PTA, IPA and DMT is simple: manufacture, distributor/importer, end user. There are a limited number of big plants in Europe using cobalt diacetate under strictly controlled conditions, therefore the use is not widespread. When cobalt diacetate is the catalyst in the manufacture of PTA it is used in solution within strictly controlled conditions. Worker exposure is zero to minimal There is no cobalt diacetate in the finished Pure Terephthalic Acid. Verbal-argumentative approach: LCUK supports the CPME argument that, given that the major use of cobalt diacetate (70-80%) is as a catalyst for the manufacture of PTA, IPA and DMT, that less than 500 tonnes/a are used in this application, that the powder form is not handled and that these operations are carried out under strictly controlled conditions, cobalt diacetate is clearly NOT a high volume dispersive use substance as proposed. This use does not give rise to worker exposure. It is noted that in this catalyst application the substance is handled in the same manner as an intermediate under strictly controlled conditions but because it is a catalyst use and does not meet the REACH definition of an intermediate it is not exempt from authorisation as an intermediate would be. This suggests that disproportionate regulation is being applied to this catalyst use compared to an intermediate substance handled under the same strictly controlled conditions.

			Scoring Approach: LCUK agrees with the CPME view that the scoring approach needs to be revised to take account of the revised information available on cobalt diacetate. Using the ECHA scheme [General Approach for Prioritisation of Substances of Very High Concern (SVHCs) for Inclusion in the List of Substances Subject to Authorisation] a score can be derived as follows – • Intrinsic Properties (threshold carcinogen) - score 0 • Volume (100-1000 tes/a) - score 5 • Wide Dispersive Use 2 (10-100 sites) * 1 (non diffuse/controlled) = - score 2 TOTAL score = 7 This is in significant contrast to the ECHA proposal which derived a score of 16/17 based on incorrect inputs. Interestingly ,even if all the non catalyst uses that are in scope for authorisation were seen collectively as being diffuse/uncontrolled/significant release and the substance was seen as a non-threshold carcinogen, the total score would only be 10. • Intrinsic Properties (assume non threshold carcinogen) - score 1 • Volume (10 -100 tes/a) - score 3 • Wide Dispersive Use 2 (10-100 sites) * 3 (diffuse/uncontrolled/signif) = score 6 TOTAL score = 10 On this basis the Prioritisation that has been carried out on inappropriate data is flawed and the case for cobalt diacetate being subject to authorisation should be reconsidered. Furthermore if a tier II prioritisation process were applied [Consideration of relevant information regarding regulatory coherence and effectiveness] then it is clear that in the case of the major use (catalyst under strictly controlled conditions) it would be apparent that no significant regulatory benefit would accrue from applying Authorisation to the main use of cobalt diacetate.

655	2011/09/09 11:37 File attached Confidential	MACHEREY-NAGEL GmbH & Co. KG Company Germany	Cobaltdichloride is the color reactive component of humidity indicators. The substitution by less dangerous chemicals can be done for great range of humidity percentage. But for higher values (> 50% humidity) only cobaltdichloride has a visible color change and is necessary for this analytical range. Humidity indicators (completely impregnated) contain cobalt up to 2.5% Co. Spotted humidity indicators contain max. 0.1% Co. Cobaltdichloride is bonded on cellulose fibres (Risk evaluation see attached report "Appraisal CoCl2_Hoeke_MN_de.pdf"). An applicant can get possible contact to ONE humidity indicator sheet per apparatus by regularly use (minimized hazard risk of inhalation). In our opinion this application fulfils an exemption from the authorisation requirement according to art. 58 (2). Max. tonnage 100 kg per year
646	2011/09/08 19:20	 Company Italy	Artenius Italia, a CPME member, agrees with CPME comments on the use of Cobalt(II) diacetate. Cobalt is used for special products (PETG resins) requiring high quality colours level. This use is phased out at end 2011. More time is necessary for the replacement (phase out end 2012?). Cobalt diacetate is used under controlled conditions. Moreover the substance is already present in the list of Regulation 10/2011. This should confirm that the final product may be considered safe once fulfilling the requirements on Food Compliance.

644	2011/09/08 18:41	Xstrata Nikkelverk AS Company Norway	Cobalt Diacetate We have serious concerns that the quality of the data in the supporting documents is insufficient for a valid Prioritisation of cobalt diacetate. It is flawed and misleading in many key respects. This important decision must be based on facts, and not speculation, to protect the integrity of the REACH process. We respectfully request that ECHA and the Member State representatives take the necessary time to correct the quality of the data in the supporting documents in all the key areas BEFORE any Prioritisation evaluation of the five cobalt compounds is attempted, in order to avoid unnecessary economic hardship to the European cobalt chemical industry and its downstream users. Our concerns are detailed as follows: 1. Ranking process - We are concerned that some of the risks posed by cobalt diacetate have been over estimated by some components of the ranking process. This appears to have been the result of some high level assumptions, particularly on the tonnage and how this is used by the downstream Industry. From recent work commissioned by the Cobalt REACH Consortium, we recommend that the following elements of the ranking process criteria should be reviewed before any decision is taken to place cobalt diacetate on Annex XIV: a. Tonnage – REACH registration tonnage bands have been used to estimate tonnage produced / used. This approach guarantees an overestimate of the tonnage in question because of the use of the upper end of the range in the ranking process, and also because it will ignore production volumes destined for export, which are within the scope or REACH registration, but outside the scope of Authorisation. It is our understanding from a survey commissioned by the Cobalt REACH Consortium that the EU/EEA tonnage of this substance, adjusted for exports is at best only one tenth of the 10,000 mt p.a. upper end of the range used in the ranking. This is significant and should result in a reduction in the score for this criterion within the ranking process. This tonnage is reduced further when uses that are out of scope are considered. b. Uses – Many of the uses listed in the document are not specific to cobalt diacetate, and relate to applications of other cobalt chemicals. This is misleading, especially where these uses are then stated to be related to high exposures and wide dispersive use. These statements are then inappropriately reflected in the ranking score for these criteria. Only uses of the compound in question should be considered in the Prioritisation process in line with the legislation. A current Cobalt REACH Consortium survey reveals the following end use split for cobalt diacetate:

			- Raw material used in the manufacture of catalysts – approx. 90% of EU/EEA tonnage - Manufacture of other chemicals – approx. 5% of EU/EEA tonnage - Used as a pigment in PET bottles – less than 5% (use being phased out, we understand) Other uses, even if listed in the REACH dossiers, can be considered to be extremely low. There are no identified 'professional uses' of cobalt diacetate with its attendance concerns for high exposure and wide dispersive use. All applications are industrial with no consumer exposures identified. It is critical for the integrity of the Prioritisation process that assumptions used for value judgments on wide dispersive use, non-intermediate status, etc. in the supporting document MUST be based on data, and not the absence of data. c. 'Intermediate status' – The primary use of cobalt diacetate is as a catalyst. One of its main uses is in the production of terephthalic acid in the manufacture of synthetic fibres, and also as an oxidation catalyst for other processes. Unlike the other cobalt compounds under review used in the manufacture of catalysts, the cobalt diacetate is present in the finished product, and so is not an 'intermediate' within the legislation. However, the use of cobalt acetate as a catalyst may be considered for special exemption as the tonnage is still relatively small, and the compound is used in liquid form. Inhalation exposure is therefore always going to be limited, especially because the use is always in closed reaction chambers under very strictly controlled conditions. d. Wide dispersive use – the quantification of the 'wide dispersive use' has been impacted by inappropriate assumptions on the uses of cobalt diacetate, and should be adjusted for the actual applications shown above. The ranking score should be reduced to reflect this. Where doubt remains, the actual number of sites should be measured, rather than rely on speculation. e. Interchangeability / Substitutabilty - It is our understanding that it is not possible to substitute cobalt diacetate by the other cobalt compounds for these applications. Of the five cobalt compounds, this is the only organic chemical. Acetic acid is the solvent in this chemistry. It is important for purity considerations to avoid the introduction of other inorganic cations into the process. All European producers of the monomers use cobalt diacetate as the oxidation catalyst, and this cannot be substoituted by the other inorganic compounds. We understand interchangeability is a core assumption to 'grouping' the five

			cobalt substance, and we recommend that this be reconsidered in the light of this information. 2. Lack of good data - The lack of detailed information in the documentation is exemplified by the widespread use of "appear to be", "seem to be", etc. prefacing the key statements about tonnages, uses, and what is in, and what is out, of the scope of Authorisation. Given the very significant economic impact on companies and employees of a decision to place substances on Annex XIV, we would strongly recommend that more time is taken to improve the quality of the data used to make the Prioritisation determination for this substance, particularly at this time of economic hardship across Europe. 3. Exposure data – We understand that much of the exposure data used in the background document dates from 1994. The REACH registrations for these substances contain a wealth of data about exposure scenarios, and risk characterisation. Given that Authorisation is a part of the REACH process, it seems inappropriate to decide on the prioritisation of this substance without considering the REACH data available as the basis of the supporting document. 4. Regulatory efficiency – All applications of cobalt acetate are used in an industrial setting covered by existing workplace regulation, that there is therefore no consumer exposure issue. Given that this is the only organic chemical amongst the five cobalt compounds, interchangeability is not likely to be technically or economically possible. With the use as a catalyst in liquid form, and closed reaction vessels the environmental and health benefit to be realized by placing cobalt carbonate on Annex XIV would seem to be very small, and dot representative of the ranking given to the substance. We are concerned that the credibility of the REACH and Authorisation process could be put at risk by decisions taken on incomplete and, in some cases, misleading information. This important decision must be based on facts and not speculation. 5. Economic impact - The cobalt industry is small but significant in value terms for Europe. Cobalt diacetate , as are the other cobalt compounds subject to this review, is a critical raw material that is the starting point for a range of downstream industries. Cobalt acetate cannot be substituted today for its catalytic use by the other compounds. Rather than apply for Authorisation, with its implicit drive to substitution, we believe companies will move their manufacturing outside of Europe. If health and the environment are not being put at risk, due to strictly controlled containment in use, with no consumer risk, it

			seems to be an economically expensive course of action for European Industry. This highlights the fact that, unlike REACH registration, Authorisation, as a process, only impacts European industry. We believe that these decisions should not be taken lightly as their economic impact on Europe can be profound. Xstrata Nickel produces high purity cobalt metal, and does not produce any of the cobalt compounds under review. However, our concern is for the cobalt market in Europe as a whole, and for the efficacy and credibility of the REACH and the Authorisation process. To the best of our knowledge, the above statements contained here are correct, and are provided in good faith.
614	2011/09/08 09:45 File attached	Schaeffler Technologies GmbH & Co. KG Company Germany	see attached statement
594	2011/09/07 12:59	Company Germany	

586	2011/09/05 17:31 File attached	Committee Of PET Manufacturers in Europe Industry or trade association Belgium	GENERAL COMMENTS a) Although CPME previously contributed comments to the Netherlands the background information behind the proposal for Authorisation is incomplete and somewhat confused. Important regulatory decisions MUST be based on sound information. Wrong decisions will waste regulatory resources and cause unjustifiable damage to industry b) Time must be allowed for sound information to be made available before final decisions are made. c) Current information shows that the ECHA prioritisation greatly overestimates concern. This means that the decision to propose cobalt diacetate for authorisation should be revisited in the light of the new information. d) A balanced and informed reassessment is essential for the process to retain credibility.
574	2011/09/01 13:38	Umicore NV/SA Company Belgium	We would like to emphasize the following: • The actual EU tonnage of cobalt diacetate is in the range of 100-1.000tpa, in contrast with range of 1.000-10.000 tpa as reported in the consultation document. • A REACH registration dossier and chemical safety report were submitted for cobalt diacetate by the end of 2010. This includes an exposure scenario for each identified and supported use, each resulting in a risk characterization ratio below 1. Therefore it can be safely assumed that all uses of cobalt diacetate in the EU are well controlled and the criteria of 'wide dispersive use' are not met. • Cobalt diacetate is already controlled by existing legislation to protect human health and environment. As an example risk management is already imposed by the carcinogens at work directive (2004/37/EC) and the IPPC directive (2008/1/EC). Furthermore all CMR compounds are restricted for supply to the general public, excluding consumer exposure (REACH, Annex XVII, entry 28-30). • There is a misconception regarding interchangeability. It should be noted that cobalt diacetate cannot be easily substituted by other cobalt salts in its applications. In nearly all cases it is neither technically and/or economically feasible to implement such a change. • Major application (~90%) of cobalt diacetate is use as a catalyst in the production of terephthalic acid (PTA), dimethyl terephthalate (DMT) and isophthalic acid (IPA), all being critical monomers for the production of essential polymers (e.g. PET) in our daily lives. Based on the above Umicore is of the opinion that including cobalt acetate in Annex XIV seems disproportionate.

			In addition to the above we support the comments made by the Cobalt REACH Consortium (CoRC).
565	2011/08/30 21:39 File attached Confidential	Cobalt REACH Consortium Ltd (CoRC) Industry or trade association United Kingdom	INTRODUCTION The following joint response comments are provided by the Secretariat of the Cobalt REACH Consortium Ltd (CoRC) on behalf of the Consortium member companies. The Cobalt REACH Consortium was founded in November 2007 by the Board of Directors of the Cobalt Development Institute (CDI) to implement REACH on behalf of the cobalt industry. There are currently 50 Regular members of the Consortium. The Consortium member companies and their affiliates constitute over 80 industry companies involved in the manufacturing and/or import of cobalt substances in Europe as well as other international jurisdictions. There are also some downstream users represented amongst the Consortium membership. The Cobalt Consortium provided joint response comments to the first consultation conducted for cobalt diacetate in 2010 (SVHC proposal and Annex XV dossier by The Netherlands). VOLUME(S) IMPORTS/EXPORTS (Section 2.2.1, page 1) The data on the tonnage of cobalt diacetate manufactured/imported in the EU collected by the CoRC from EU manufacturers and downstream users in 2011 indicate that the range of 1,000 – 10,000 quoted in the consultation document from REACH registration data is an overestimate for the actual volume of cobalt diacetate on the EU market. Based on data collated by the CoRC from EU Manufacturers and Downstream Users, the total tonnage of

			cobalt diacetate on the EU market, corrected for export, is between 100 and 1,000 tonnes per year. MANUFACTURE AND RELEASES FROM MANUFACTURE (Section 2.2.2.1, page 2) In addition to the manufacturing process described in the background document other cobalt salts can be used in the production of cobalt diacetate. The exposure data cited in the background document is from 1994 and is not specific to cobalt diacetate. A summary of exposure scenarios developed by the CoRC for the REACH registration of cobalt diacetate is attached to this consultation response for information. Based on these comprehensive assessments, which incorporate both the inherent exposure potential of a use in combination with recommended risk management measures, all the registered uses of cobalt diacetate can demonstrate effective control of exposure and can be considered safe uses. As the REACH dossier contains exposure scenarios for all identified uses of cobalt diacetate these should be used in preference to the historic or literature values currently quoted in the background document that may be relevant to uses that are not supported under REACH or not consistent with the exposure scenarios established for cobalt diacetate. USES AND RELEASES FROM USES (Section 2.2.2.2, pages 2 to 4) The section on uses in the background document is not specific to the identified uses of cobalt diacetate and does not clearly identify or distinguish between those uses of cobalt diacetate that are outside of the scope of Authorisation and those uses that are likely to be within the scope of Authorisation, or subject to use-specific exemptions to Authorisation. The CoRC would welcome any revision to section 2.2.2.2 that allows the identified uses of cobalt diacetate that are within scope of Authorisation to be clearly distinguished from the identified uses that are outside of the scope of Authorisation (e.g. general exempted uses, or uses subject to a use-specific exemption). In addition, it would be beneficial if uses were listed within each section from the largest to the smallest tonnage. Data collated by the CoRC from EU manufacturers and downstream users in 2011 indicate that the identified uses of cobalt diacetate and their respective proportions are as follows:

			Use as a catalyst (between 70 to 80% of EU tonnage) in the production of: -terephthalic acid (PTA) -dimethyl terephthalate (DMT) -isophthalic acid (IPA) -oxidation catalyst for other processes (e.g. production of benzoic acid) The CoRC consider that the use of cobalt diacetate as a catalyst for PTA, DMT and IPA production should be considered as a candidate for a use-specific exemption to Authorisation. Use as a pigment in PET bottles. < 10% EU tonnage (note, this use is being phased out in 2011). As an intermediate in the production of other chemicals, (and therefore exempt from Authorisation, REACH Title 1, Chapter 1, Article 2, 8b). Approximately 5% of EU tonnage is used. These uses can be further summarized as: -Manufacture of other chemicals. ~5% -Manufacture of catalysts. Very low, < <1%. -Manufacture of inorganic pigments. Very low, <1% Use in surface treatment. <5% EU tonnage. Use as a rubber adhesion agent. <<1% EU tonnage Use as an animal feed supplement (and therefore exempt from Authorisation, REACH Title 1, Chapter 1, Article 2, 5b). Very low, ~1%. Data collated by the CoRC from EU Manufacturers and Downstream Users indicates that the majority of cobalt diacetate produced or imported into the EU (70 - 80%) is used as a catalyst in the manufacture of other chemicals. Up to 10% is used as a pigment in PET bottles. However, as is noted in the background document this use is being phased out by the end of 2011 and we would suggest that this application is removed from the background document. Up to 5% is used as an intermediate in the manufacture of other chemicals. This includes use in the production of other chemicals, catalysts and pigments. Use of a substance as an intermediate is exempt from Authorisation under REACH, and therefore these tonnages should be considered outside of the scope of authorisation for prioritization.

			Use of cobalt diacetate as an intermediate in the manufacture of cemented tungsten carbide powder is identified in the REACH dossier for cobalt diacetate. However, according to EU Manufacturer and Downstream User data, the volumes reported for this use are very low (<1% EU tonnage). Up to 1% of the EU tonnage is used as an animal feed supplement. This use is also exempt from Authorisation under REACH, and therefore these tonnages should be considered outside of the scope of authorisation for prioritization. As noted, an updated summary of exposure scenarios developed by the CoRC for the REACH registration of cobalt diacetate is attached to this consultation response. The ECHA background document states that the number of workers and professional users involved in the use of cobalt diacetate might be high. This assumption is not considered to be valid by the CoRC as all but three of the registered uses of cobalt diacetate identified in its REACH registration dossier are for industrial uses only. Identified professional uses relate to the use of feed grade materials that contain cobalt diacetate (which are exempt as covered by other legislation), the use of plastics/PET that contain cobalt diacetate (where the use of cobalt diacetate in PET is being phased out by the end of 2011), and the use of surface treated massive objects (where cobalt diacetate has been transformed into another cobalt substance that is present in the coating on the plated object). Therefore, widespread exposure to professional users (if any) from the professional uses of cobalt diacetate identified in the REACH dossier is not expected to occur. The main route of occupational exposure from cobalt diacetate is via inhalation. For the major use (as a catalyst) cobalt diacetate is generally handled as a liquid under closed conditions, thereby eliminating or minimising the risk. Handling of cobalt diacetate as a catalyst in the production of terephthalic acid (PTA), isophthalic acid (IPA) or dimethyl terephthalate (DMT) is carried out under tightly controlled conditions – equivalent to strictly controlled conditions for intermediates. Therefore, the potential for release or exposure is minimized. The data reported for consumer exposure to cobalt salts (hobby paints, cosmetics and dinnerware) are not specific to cobalt diacetate (but relate to cobalt metal) and should be revised or omitted from the background document as they are not directly relevant to cobalt diacetate. In addition, the use of substances in food contact materials are outside of the scope of Authorisation. The CoRC do not consider there to be any consumer uses of cobalt diacetate. GEOGRAPHICAL DISTRIBUTION AND CONCLUSIONS IN TERMS OF (ORGANISATION AND COMMUNICATION IN) SUPPLY CHAINS (Section 2.2.2.3, page 5)

			This section could be made clearer by identifying the uses that are within scope of Authorisation, if any. As the complexity of the supply chain is one of the factors that feeds into the prioritisation score this section should relate solely to the geographical distribution and supply chain of the uses that are potential candidates for Authorisation. CoRC would welcome that the structure of section 2.2.2.3 is changed to only include uses in scope of Authorisation. Based on responses received to date we estimate around 10-20 industrial sites involved with uses that may be within the scope of Authorisation. AVAILABILITY OF INFORMATION ON ALTERNATIVES (Section 2.3, page 6) It is not reasonable to assume that other cobalt salts could generally replace cobalt diacetate for its major application as a catalyst. Although common uses may have been identified for the purpose of generic exposure scenarios this does not mean that the exact use is the same, nor that it is technically or economically feasible to implement this change. Industrial processes are usually designed for a specific salt and it would not be a simple matter of replacing one salt with another. Even if the salt could be substituted chemically there would be a number of practical considerations to take into account. No interchangeability would be possible without considerable development work and costs to switch from cobalt diacetate to another salt. For example, the other cobalt salts cannot be used to substitute for cobalt diacetate in oxidation catalyst use within Terephthalic acid manufacture for reasons of process contamination (acetic acid is the process solvent in this chemistry). Using cobalt diacetate prevents the introduction of contamination from other anions into the process (e.g. which can poison the catalyst system, release NOx fumes or corrode the plant infrastructure). All producers of these polyester monomers in the EU use cobalt diacetate as the oxidation catalyst in their processes. There are no viable alternatives to cobalt acetate as a component of the catalyst system for PET manufacture. All alternative technologies are not considered to be economically viable and Authorisation would result in production moving outside of Europe. However, the use of cobalt diacetate as a pigment in PET could be removed as a use as alternatives are available, as noted in the consultation document. No information is available on the potential alternatives for use as a rubber adhesion agent. EXISTING SPECIFIC COMMUNITY LEGISLATION RELEVANT FOR POSSIBLE EXEMPTION (Section 2.4, page 6) The use of cobalt diacetate as an animal feed supplement would fall within the scope of feed safety regulation (EC 178/2002).

			The Carcinogens Directive (90/394/EEC), Directive 98/24/CE, Directive 2004/37/CE all apply to CMR compounds. Risk management is already required by existing legislation as for example the carcinogens at work directive (Dir. 2004/37/EC and the IPPC directive (Dir. 2008/1/EC). PRIORITISATION (Section 3.1, page 6) The data in the registration dossier and updates to be submitted by the end of this year indicate that cobalt diacetate is non genotoxic in vivo, suggesting a threshold mode of action. We acknowledge that ECHA have taken account of the new data indicating that cobalt diacetate has a threshold concentration for carcinogenicity in the scoring for inherent properties. Furthermore, several of the identified uses are exempt from Authorisation. For the uses that are not exempt, risk management is already required by existing legislation as for example the carcinogens at work directive (Dir. 2004/37/EC and the IPPC directive (Dir. 2008/1/EC). The volumes of cobalt diacetate reported by ECHA are considerably higher than those recently reported to the CoRC from EU manufactures and Downstream Users. Based on an EU tonnage of <1000tpa (CoRC data) a volume score of 5 is more appropriate for cobalt diacetate than the 7 proposed in the ECHA background document. Based on the data collected by the CoRC from EU Manufacturers and Downstream Users, there are between 10 – 20 sites involved in the uses of cobalt diacetate within the scope of Authorisation. We would consider that a site score is of 2 is therefore more appropriate than the 3 in the ECHA background document. The use of cobalt diacetate at these sites is controlled under existing legislation and has been shown in the CoRC REACH CSR for cobalt diacetate to have RCR below 1. As such, the appropriate release score for this use would therefore be 1 (non-diffuse, controlled), rather than the 3 (diffuse, uncontrolled, significant) proposed in the ECHA background document. The overall prioritization score would therefore be: 0-1 (properties) + 5 (volume) + 2 (WDU) = 7-8 ECHA states the cobalt diacetate is of high priority and should be placed on Annex XIV as there are other cobalt compounds that could replace it. We would argue that a lower score (7-8) should be assigned, due to the lower number of sites in scope and the minimal potential releases from the uses in scope and we disagree strongly with the statement that other cobalt compounds could replace cobalt diacetate in its uses. We therefore do not believe that cobalt diacetate should be prioritized for inclusion on Annex XIV. REFERENCES (Section 4, page 7)

			Please note that the internet links provided under '4. References' are no longer working. Without being able to retrieve the information on which the Annex XV is based it is not possible for independent third parties to make a proper assessment and comments.
548	2011/08/24 14:00	WWF European Policy Office International NGO Belgium	WWF supports the prioritisation for inclusion in Annex XIV based on its high volume within the scope of authorisation and the wide dispersive use.
514	2011/07/29 17:14	Company Italy	

II - TRANSITIONAL ARRANGEMENTS. COMMENTS ON THE PROPOSED DATES:

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1806	2011/09/14 20:50 File attached	ACEA - European Automobile Manufacturers Association Industry or trade association Belgium	See attachment.
1735	2011/09/14 18:22	The Cobalt Development Institute Industry or trade association United Kingdom	Please refer to the following document for technical details: 1) final Joint Response Comments (JRC) on the five cobalt salts that were submitted into the present ECHA stakeholder consultation on Tuesday 30 August 2011 2) Technical Annex to the Cobalt Reach Consortium's (CoRC) Joint Response to ECHA's Consultation on the Proposed Inclusion of cobalt diacetate in Annex XIV of REACH (submitted September 2011)

1851	2011/09/14 18:22 File attached	The Cobalt Development Institute Industry or trade association United Kingdom	Please refer to the following document for technical details: 1) final Joint Response Comments (JRC) on the five cobalt salts that were submitted into the present ECHA stakeholder consultation on Tuesday 30 August 2011 2) Technical Annex to the Cobalt Reach Consortium's (CoRC) Joint Response to ECHA's Consultation on the Proposed Inclusion of cobalt diacetate in Annex XIV of REACH (submitted September 2011)
1648	2011/09/14 16:12	Portugal MemberState Portugal	

1526	2011/09/14 13:00 File attached	Enthone GmbH Company United Kingdom	see attached
1227	2011/09/14 01:01 File attached	CETS aisbl Industry or trade association Germany	Should cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate be prioritised for Annex XIV inclusion, it is imperative that the application and sunset dates be extended. As a non-threshold carcinogen, an application for authorization for the Cobalt salts will need to include a socio-economic analysis. Given the complexity of the supply chains of articles subject to surface treatment, additional time is needed. In that respect, the following dates should apply: application date (date for submitting applications for authorisation): July 2015 ; and sunset date: January 2017. A failure to grant additional time would have the practical effect of transforming the Annex XIV listing into an outright ban.

1185	2011/09/13 19:45 File attached	DALIC Company France	We need an extension of the deadlines (48 months instead of 24 months as mentioned in the recommendation). Please see the enclosed letter.
1120	2011/09/13 18:10	Atotech Deutschland GmbH Company Germany	If the cobalt salts are included in Annex XIV in the near future the proposed timeframe is too short for several reasons: • Article 55 says that it is the aim to "ensure the good functioning of the internal market" by progressively replacing SVHC by "suitable alternative substances or technologies where these are economically and technically viable". The regulation specifically uses the word "progressively" implying that the users must be granted an appropriate timeframe for the transition from one technology/substance to another, where possible. • The authorization process is new and has never been used before. This implies that the applicants as well as all associated supporting entities need time to adapt to this new requirement in order to be able to provide information and documentation in accordance with regulation's requirements. 18 months are not an appropriate timeframe considering that o small and medium users need external support for this process, o users may wish to organize in groups for cost sharing, o users have to select appropriate supporters, o documents need to be finalized including reviews etc., o the capacity of supporting entities is limited. • Five cobalt salts are present in ECHA's draft recommendation for inclusion on Annex XIV. As these salts and chromium trioxide are used for surface treatment, this sector of industry does not have the capacity of handling two authorization processes at a time. Surface treatment shops usually are small to medium size companies that do not have the

			capacity to handle regulatory requirements of this extent as dedicated personnel is required. • Transitions to new technologies or new requirements involve a considerable complex process, investments and time. A complex process involving the whole supply-chain is triggered. Solely qualification processes for example for electronics applications take several years from the developed technology until application at the final product. Clearly these processes are very complex as the final product's properties may be safety-relevant.
1039	2011/09/13 16:40	Company Portugal	The sunset date of 18 months seems very short considering the time it would take to implement a change in process or substitution at an industrial scale for the uses in scope of Authorisation. A minimum period of 36 months would be more reasonable.

974	2011/09/13 14:40	Sweden MemberState Sweden	We agree with the proposed dates.
927	2011/09/13 13:12	Dr. Kubitz GmbH Company Germany	Too early

916	2011/09/13 12:36 File attached Confidential	Company Germany	As stated in the comments about alternatives, no viable alternatives for Cobalt(II) diacetate in the manufacture of DMT have been identified to date. The proposed sunset date (date of inclusion plus 42 months) would very likely not allow enough time to start a R&D program, identify an alternative, confirm its viability under production conditions and then to implement that new technology into plants that may need to be re-designed or newly built depending on the nature of the alternative. We cannot propose an implementation date, as the success of additional R&D cannot be predicted and furthermore a costly re-design / new build of plants in the EU is economically questionable.
945	2011/09/13 12:36 File attached Confidential	Company Germany	As stated in the comments about alternatives, no viable alternatives for Cobalt(II) diacetate in the manufacture of DMT have been identified to date. The proposed sunset date (date of inclusion plus 42 months) would very likely not allow enough time to start a R&D program, identify an alternative, confirm its viability under production conditions and then to implement that new technology into plants that may need to be re-designed or newly built depending on the nature of the alternative. We cannot propose an implementation date, as the success of additional R&D cannot be predicted and furthermore a costly re-design / new build of plants in the EU is economically questionable.
888	2011/09/13 11:44 File attached	Company Belgium	

865	2011/09/13 01:01 File attached Confidential	BP Chembel NV Company Belgium	Transitional Arrangements – Comments on the proposed dates If, in the event that cobalt diacetate were to move to authorisation a period of 24 months to submit an application would appear to be reasonable and longer than some of the other substances listed. However the sunset date of 18 months is considered to be a very short timescale considering the time it would take to implement a change in process or substitution at an industrial scale for the uses in scope of Authorisation. A minimum period of 36 months would be considered more reasonable in the circumstances.
830	2011/09/12 17:54	Reactana Katalysatoren und Chemikalien GmbH Company Germany	36 month required

799	2011/09/12 16:16	Company United Kingdom	Taking into account the time needed for eventual changes in industrial process or substitution at industrial scale, we think it is reasonable to propose a sunset date 36 months after the application date.
797	2011/09/12 16:09 File attached	Company Spain	For the reasons mentioned in the previous section, we strongly believe that Cobalt acetate should be exempted for its use as catalyst in the manufacture of PTA/IPA/DMT., and hence Application and Sunsets date would not apply. Nevertheless, should our proposal for exemption not be taken into account, we would consider that 24 months to submit an application would seem reasonable and longer than some of the other substances listed. However the sunset date of 18 months seems very short considering the time it would take to implement a change in process or substitution at an industrial scale for the uses in scope of Authorisation. A minimum period of 36 months would be more reasonable
744	2011/09/12 11:24	Company France	We need an extension of the deadlines

732	2011/09/12 10:11	Company Spain	24 months to submit an application would seem reasonable and longer than some of the other substances listed. However the sunset date of 18 months seems very short considering the time it would take to implement a change in process or substitution at an industrial scale for the uses in scope of Authorisation. A minimum period of 36 months would be more reasonable.
720	2011/09/10 17:54	Company Finland	Comments on the proposed dates: 24 months to submit an application would seem reasonable. The sunset date of 18 months seems very short considering the time it would take to implement a change in process at an industrial scale. A minimum period of 36 months would be more reasonable.

679	2011/09/09 13:25	Lotte Chemical UK Ltd Company United Kingdom	24 months to submit an application would seem reasonable and longer than some of the other substances listed. However the sunset date of 18 months seems very short considering the time it would take to implement a change in process or substitution at an industrial scale for the uses in scope of Authorisation. A minimum period of 36 months would be more reasonable.
586	2011/09/05 17:31 File attached	Committee Of PET Manufacturers in Europe Industry or trade association Belgium	24 months to submit an application would seem reasonable and longer than some of the other substances listed. However the sunset date of 18 months seems very short considering the time it would take to implement a change in process or substitution at an industrial scale for the uses in scope of Authorisation. A minimum period of 36 months would be more reasonable.
565	2011/08/30 21:39 File attached Confidential	Cobalt REACH Consortium Ltd (CoRC) Industry or trade association United Kingdom	24 months to submit an application would seem reasonable and longer than some of the other substances listed. However the sunset date of 18 months seems very short considering the time it would take to implement a change in process or substitution at an industrial scale for the uses in scope of Authorisation. A minimum period of 36 months would be more reasonable.

548	2011/08/24 14:00	WWF European Policy Office International NGO Belgium	The timelines foreseen for transitional arrangements are too long. They should be shortened to an application date of 12 months (sun set date 30 months) after the date of inclusion in Annex XIV in order to encourage the replacement of this substance in its current uses. This corresponds with the Commission Service estimate that the average time needed (for the preparation of a new application for authorisation) amounts to roughly 12 months, as mentioned in the Guidance on inclusion of substances in Annex XIV (p.35).

III - COMMENTS ON USES THAT SHOULD BE EXEMPTED FROM AUTHORISATION, INCLUDING REASONS FOR THAT:

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1806	2011/09/14 20:50 File attached	ACEA - European Automobile Manufacturers Association Industry or trade association Belgium	See attachment.
1783	2011/09/14 19:43	mbw GmbH metallveredelung & mbw	Die mbw-Gruppe kann auf Grund der oben angeführten Argumente die Aufnahme der Kobalt-Salze in den Anhang XIV der REACh-Verordnung nicht unterstützen. Im Falle einer Aufnahme der Stoffe Kobalt(II)-dinitrat, Kobalt-dichlorid, Kobalt(II)-sulfat,

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
	File attached Confidential	Company Germany	Kobalt(II)-diacetat, Kobalt(II)-carbonat in den Anhang XIV der REACh-Verordnung fordert die mbw-Gruppe eine Ausnahmeregelung für die Verwendung von Kobaltsalzen in Lösungen zur Erzeugung von Konversionsschichten auf Zink- und Zinklegierungsschichten bei galvanischen Korrosionsschutzsystemen.
1735	2011/09/14 18:22	The Cobalt Development Institute Industry or trade association United Kingdom	Please refer to the following document for technical details: 1) final Joint Response Comments (JRC) on the five cobalt salts that were submitted into the present ECHA stakeholder consultation on Tuesday 30 August 2011 2) Technical Annex to the Cobalt Reach Consortium's (CoRC) Joint Response to ECHA's Consultation on the Proposed Inclusion of cobalt diacetate in Annex XIV of REACH (submitted September 2011)

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1851	2011/09/14 18:22 File attached	The Cobalt Development Institute Industry or trade association United Kingdom	Please refer to the following document for technical details: 1) final Joint Response Comments (JRC) on the five cobalt salts that were submitted into the present ECHA stakeholder consultation on Tuesday 30 August 2011 2) Technical Annex to the Cobalt Reach Consortium's (CoRC) Joint Response to ECHA's Consultation on the Proposed Inclusion of cobalt diacetate in Annex XIV of REACH (submitted September 2011)
1668	2011/09/14 16:41 File attached	FEFANA asbl and TREAC EEIG Industry or trade association Belgium	see attached pdf file

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1651	2011/09/14 16:20	Equipolymers Company Italy	As downstream users, if the use of cobalt diacetate as a catalyst for PTA and IPA will fall under the authorization process, we have two main concerns. The first is regarding the PET production process and the second is the economic consequences that the authorization process will have. Currently the residual cobalt content in PTA and IPA is less than 1 ppm and during the polymerization process, this small amount of cobalt is bound into the polymer. Actually, in the past larger amount of cobalt (up to 30 times higher) were used by manufacturers of PET to prevent discoloration (yellowing) of the polymer. Nowadays for this use cobalt acetate has been replaced by organic pigments. The polymerization process of PET takes place under high temperature and high vacuum. Any trace of cobalt acetate that might be present in the PTA and IPA used as monomers, reacts during the polymerization process in such a way that acetic acid is removed together with the water released during the condensation reaction, while the metal is bound into the polymer in an insoluble form. If cobalt acetate is replaced in its use as a catalyst with another chemical compound (which, as we understand, it has not yet been discovered), our concern is that residuals of this replacement catalyst could impact the polymerization process. The polycondensation reaction that leads to PET production is a very sensitive one. It not also requires high temperature and high vacuum, but it also requires raw materials of very high purity. It is known that impurities, even in the ppm range, can impact the reaction up to the point of not allowing the production of PET suitable for packaging applications. Small traces of cobalt acetate are known to be no issue (cobalt is bound and acetate is removed as acetic acid), but a replacement could poison the reaction, or even leave traces of impurities in the polymer that make it unsuitable for its main use, i.e. food packaging applications. From an economic point of view, if the use of cobalt acetate as a catalyst for PTA and IPA production will fall under the authorization process, our European suppliers will have to incur into additional costs, to fulfill the requirements. They will have no choice than to pass those additional costs down the supply chain. As downstream users, we will face a raw material cost increase, which we would not be able to pass to our customers, because they have the option of purchasing PET made outside the EU. In the worst case scenario, we will be forced to switch to non EU suppliers of PTA and IPA, again bearing a raw material cost increase, because of the higher transportation costs (2-4 times higher). Both scenarios are

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			a serious long term threat to our sustainability as a European PET manufacturer and of the European PET industry in general. Over the past years this industry has been fighting to survive under the pressure of imports from non EU countries. On the other side, non EU producers will continue to use the current cobalt acetate based technology and will be free to ship PTA, IPA and the PET polymer made from them, into the EU without consequences and with a distinct competitive advantage over the EU PET producers (like our company). As said at the beginning, PET is the packaging material of choice for mineral water, beverages in general and for many other foods and non food articles. If European PET producers will face a strong competitive disadvantage, they will be swept over by non EU ones, and the EU will find itself dependent on imports for a packaging material that in some applications (like mineral water) can be really considered a strategic one. Therefore, our recommendation is that the use of cobalt acetate as a catalyst for PTA and IPA production is further investigated and if there is ample proof (we have been reassured on this point by our suppliers) that there are no risks for people, workers, and the environment, this use is specifically exempted from authorization, avoiding all the chain consequences on downstream users described before.
1648	2011/09/14 16:12	Portugal MemberState Portugal	
1537	2011/09/14 14:05	Company	Our company is a downstream user of COBALT ACETATE. Cobalt acetate is used in low volume (approx. 10 t/month) as a catalyst in the production of PTA (purified terephthalic acid), which is an intermediate for manufacture of polyester

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
		Poland	fibres. The use of cobalt acetate in the manufacture of PTA is carried out under strictly controlled conditions (SCC) in line with ECHA Guidance on Intermediates, Version 2 Dec 2010 where inhalation exposure is unlikely due to closed process plant. Moreover, the residual content of cobalt in PTA is less than 0.15 ppm wt. Cobalt acetate is not presented in the finished monomer product. Terephthalic acid does not pose a risk to the human populations and meets the criteria for classification of "no hazard" according to REACH.
1526	2011/09/14 13:00 File attached	Enthone GmbH Company United Kingdom	See attached

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1474	2011/09/14 11:39 File attached Confidential	 Company Italy	For the use in catalyst mixes an exemption should be made. At least the use of CoAc2 in aqueous catalytic mixes with other salts should be exempted because of the very much reduced exposure and no need of further manipulation in operations. "
1455	2011/09/14 10:54 File attached	A.M.P.E.R.E. DEUTSCHLAND GmbH Company Germany	In the event that these substances are included in Appendix XIV of the REACH regulations we demand that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of anti-corrosion, decorative, bright and functional Cobalt-Alloy-Plating.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1227	2011/09/14 01:01 File attached	CETS aisbl Industry or trade association Germany	• Use of Cobalt(II) diacetate for plating National and European law already require aspects of regulatory monitoring and control as well as to the increasing internationalization of requirements. Any additional configurable prioritization and approval of changes will only reproduce the current national requirements. Taking these experiences into account an inclusion of cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate for plating in Annex XIV of the REACh regulation is not necessary. Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate from the authorisation requirements. In accordance with the provisions of REACh the risk of the application is properly controlled by European and national laws. In the EU, the human health and environmental aspects for safe handling of Cobalt(II) salts are regulated the following laws and regulations: • EG 1907/2006 (REACH-regulation) • EG/1272/2008 (GHS-regulation) • 2002/95/EG (ROHS) • 2002/96/EG (WEEE) • 196/82/EG (Seveso-II-RL) • 2010/75/EU (IVU) • 2000/60/EG (WRR) • 98/249/EG

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1209	2011/09/13 21:26 File attached	 Company United Kingdom	Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of Chromium trioxide (-solutions) from the authorisation requirements. Article 58(2): Uses or categories of uses may be exempted from the authorisation requirement provided that, on the basis of the existing specific Community legislation imposing minimum requirements relating to the protection of human health or the environment for the use of the substance, the risk is properly controlled. In the establishment of such exemptions, account shall be taken, in particular, of the proportionality of risk to human health and the environment related to the nature of the substance, …. In the EU, human health and environmental aspects for safe handling of Chromium trioxide (-solutions) are regulated by the following laws and regulations: • EC 1907/2006 (REACH-regulation) • EC/1272/2008 (GHS-regulation) • 2002/95/EC (ROHS) • 2002/96/EC (WEEE) • 196/82/EC (Seveso-II-RL) • 2010/75/EU (IVU) • 2000/60/EC (WRR) • 98/249/EC For all these reasons we file for an exemption of the application of solutions containing cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate in galvanic surface treatment technologies.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1201	2011/09/13 20:24 File attached	European Biogas Association International NGO Czech Republic	Cobalt(II) acetate is an indispensable element of methanogenic bacteria metabolism, as it is the source of the trace element Cobalt. Cobalt is needed as a catalytic element for chemical reactions catalyzed by various Cobalt-based enzymes. Biogas production and utilization is an integral part of many environmental technologies like sewage sludge treatment, bio-waste treatment and also an important part of agricultural manure treatment in sustainable agriculture. Furthermore biogas utilization is an important pillar of the European bioenergy policy. The near term goals of biogas development are defined in National Renewable Energy Action Plans in all the 27 Member States.
1188	2011/09/13 19:52 File attached	Verband der Automobilindustrie VDA Industry or trade association Germany	Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of Cobalt (II) diacetate from the authorisation requirements. In accordance with the provisions of REACh the risk of the application is properly controlled by the German laws.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1185	2011/09/13 19:45 File attached	DALIC Company France	In surface treatment, closed processes like DALISTICK or processes saving CO2 and energy like DALISTICK and BRUSH PLATING, should be exempted, as well as activities covered by the strict regulations concerning health & safety and environment in reason of the existing surveillance of companies by the states. This should apply in particular to companies, which have already provided great efforts to fulfill the requirements of these regulations. For the others, it should be preferable to organize or reinforce regulations and the use of the protection measures rather than to favour their closing for economical reasons. Processes, like DALISTICK and BRUSH PLATING should be also exempted because they are sold (with solutions) and used in the whole world for local repair or local treatment on new parts (e.g. in railways, energy or print industry). Please see the enclosed letter.
1167	2011/09/13 19:09 File attached	Company United Kingdom	Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of Chromium trioxide (-solutions) from the authorisation requirements. Article 58(2): Uses or categories of uses may be exempted from the authorisation requirement provided that, on the basis of the existing specific Community legislation imposing minimum requirements relating to the protection of human health or the environment for the use of the substance, the risk is properly controlled. In the establishment of such exemptions, account shall be taken, in particular, of the proportionality of risk to human health and the environment related to the nature of the substance, …. In the EU, human health and environmental aspects for safe handling of Chromium trioxide (-solutions) are regulated by the following laws and regulations: • EC 1907/2006 (REACH-regulation) • EC/1272/2008 (GHS-regulation) • 2002/95/EC (ROHS) • 2002/96/EC (WEEE) • 196/82/EC (Seveso-II-RL) • 2010/75/EU (IVU)

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			• 2000/60/EC (WRR) • 98/249/EC For all these reasons we file for an exemption of the application of solutions containing cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate in galvanic surface treatment technologies.
1160	2011/09/13 18:56 File attached	Company United Kingdom	Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of Chromium trioxide (-solutions) from the authorisation requirements. Article 58(2): Uses or categories of uses may be exempted from the authorisation requirement provided that, on the basis of the existing specific Community legislation imposing minimum requirements relating to the protection of human health or the environment for the use of the substance, the risk is properly controlled. In the establishment of such exemptions, account shall be taken, in particular, of the proportionality of risk to human health and the environment related to the nature of the substance, …. In the EU, human health and environmental aspects for safe handling of Chromium trioxide (-solutions) are regulated by the following laws and regulations: • EC 1907/2006 (REACH-regulation) • EC/1272/2008 (GHS-regulation) • 2002/95/EC (ROHS) • 2002/96/EC (WEEE) • 196/82/EC (Seveso-II-RL) • 2010/75/EU (IVU)

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			• 2000/60/EC (WRR) • 98/249/EC For all these reasons we file for an exemption of the application of solutions containing cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate in galvanic surface treatment technologies.
1147	2011/09/13 18:38 File attached	Company United Kingdom	Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of Chromium trioxide (-solutions) from the authorisation requirements. Article 58(2): Uses or categories of uses may be exempted from the authorisation requirement provided that, on the basis of the existing specific Community legislation imposing minimum requirements relating to the protection of human health or the environment for the use of the substance, the risk is properly controlled. In the establishment of such exemptions, account shall be taken, in particular, of the proportionality of risk to human health and the environment related to the nature of the substance, …. In the EU, human health and environmental aspects for safe handling of Chromium trioxide (-solutions) are regulated by the following laws and regulations: • EC 1907/2006 (REACH-regulation) • EC/1272/2008 (GHS-regulation) • 2002/95/EC (ROHS) • 2002/96/EC (WEEE) • 196/82/EC (Seveso-II-RL) • 2010/75/EU (IVU) • 2000/60/EC (WRR)

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			• 98/249/EC For all these reasons we file for an exemption of the application of solutions containing cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate in galvanic surface treatment technologies.
1136	2011/09/13 18:27 File attached	Company United Kingdom	Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of Chromium trioxide (-solutions) from the authorisation requirements. Article 58(2): Uses or categories of uses may be exempted from the authorisation requirement provided that, on the basis of the existing specific Community legislation imposing minimum requirements relating to the protection of human health or the environment for the use of the substance, the risk is properly controlled. In the establishment of such exemptions, account shall be taken, in particular, of the proportionality of risk to human health and the environment related to the nature of the substance, …. In the EU, human health and environmental aspects for safe handling of Chromium trioxide (-solutions) are regulated by the following laws and regulations: • EC 1907/2006 (REACH-regulation) • EC/1272/2008 (GHS-regulation) • 2002/95/EC (ROHS) • 2002/96/EC (WEEE) • 196/82/EC (Seveso-II-RL) • 2010/75/EU (IVU) • 2000/60/EC (WRR)

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			• 98/249/EC For all these reasons we file for an exemption of the application of solutions containing cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate in galvanic surface treatment technologies.
1120	2011/09/13 18:10	Atotech Deutschland GmbH Company Germany	Uses where cobalt salts can not be replaced Corrosion Protection Conversion Layers Despite extensive research and development activities there is currently no alternative to cobalt salts in corrosion protection conversion layers if very high corrosion protection is required. Particularly the following industries depend on these coating systems and would be heavily affected if the high level of corrosion protection would be jeopardized by inclusion of cobalt salts in Annex XIV: ☐ Automotive industry ☐ Aerospace industry ☐ Defense ☐ Other parts of industry where corrosion protection is vital for safety Hard Gold Coating Gold-cobalt layers are used in manufacturing of electronic equipment (contactors) and jewellery. The addition of cobalt is essential for the required characteristics of the layer: hardness, abrasion resistance and microstructure. Alternatives: ☐ Gold-nickel: significantly different characteristics of the surface. Particularly reduced hardness, solderability and long-term stability limit applicability in electronics.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			☐ Gold-iron: No industrial application and very limited experiences about long-term stability ☐ Cyanide-Gold: Partially applicable for decorative applications (jewellery). Advantage from the health, safety and environmental point of view is doubtful. Tin-Cobalt Coating Tin-cobalt layers are used for decorative plating (substitute for decorative chrome plating). For barrel plating (screws and other small parts) chrome plating is not applicable and no alternative for tin-cobalt plating is available. Safe use The background documents for cobalt sulphate and cobalt dichloride state that "Releases at workplaces in industrial settings seem to be controlled in most cases but some processes, involving handling of powder forms of the substance have a potentially significant exposure potential for industrial workers." No handling of powder form of cobalt salts take place in industrial surface treatment. No other indications of significant exposure of workers or emissions to the environment are provided in the background documents or in the Annex XV reports. Existing specific Community regulations and national exposure limit ensure that risks are properly controlled. PPORD The product and process oriented research and development (PPORD) should be clearly exempted from the authorization process. Please note the following reasons: a. Alternative technology development has to use cobalt salts in order to develop further. Restrictions would hinder PPORD from fulfilling his role in the REACH framework. b. Following Article 55, the aim of the authorization is to control the risks from SVHC. In order reduce the risks from SVHC the need for PPORD is evident, which may result in optimized processes reducing the risks for human health and the environment. c. Personnel's exposure in PPORD is significantly reduced against production processes as the time of exposure is reduced, the throughput is lower by decimal powers and usually equipment with latest safety measures is used.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1109	2011/09/13 18:01 File attached	Central Association of Surface Treatment Professionals Germany (ZVO) Industry or trade association Germany	In the event that these substances are included in Appendix XIV of the REACH regulations we demand that there has to be an exception to the rules to allow the use of Cobalt(II)-Salts for the purpose of anti-corrosion, decorative and bright Cobalt-Alloy-Plating. Attachment (additional non-confidential information) ZVO Kommentierung: Application of divalent cobalt salts in Cobalt and Cobalt-Alloy-Layers in the European electroplating Industry
1101	2011/09/13 17:56 File attached	Company United Kingdom	Relating to Article 58(2) of the REACH regulation it is hereby proposed to exempt the use of Chromium trioxide (-solutions) from the authorisation requirements. Article 58(2): Uses or categories of uses may be exempted from the authorisation requirement provided that, on the basis of the existing specific Community legislation imposing minimum requirements relating to the protection of human health or the environment for the use of the substance, the risk is properly controlled. In the establishment of such exemptions, account shall be taken, in particular, of the proportionality of risk to human health and the environment related to the nature of the substance, …. In the EU, human health and environmental aspects for safe handling of Chromium trioxide (-solutions) are regulated by the following laws and regulations: • EC 1907/2006 (REACH-regulation) • EC/1272/2008 (GHS-regulation) • 2002/95/EC (ROHS) • 2002/96/EC (WEEE) • 196/82/EC (Seveso-II-RL)

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			• 2010/75/EU (IVU) • 2000/60/EC (WRR) • 98/249/EC For all these reasons we file for an exemption of the application of solutions containing cobalt(II)-sulphate, cobalt(II)-nitrate, cobalt(II)-chloride, cobalt(II)-acetate and cobalt(II)-carbonate in galvanic surface treatment technologies.
1055	2011/09/13 16:55	Agoria Industry or trade association Belgium	Agoria propose to integrate clearly the fact that most of the uses of the different cobalt salts are used as intermediate and thus exempted from the authorization procedure.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1039	2011/09/13 16:40 Company Portugal		Diacetate cobalt use as catalyst in PTA manufacturer should be exempted from Authorization process due to the following reasons: a) Brief description of cobalt use Diacetate cobalt is used as catalyst in the oxidation of paraxylene, and is not incorporated in the product, terephthalic acid. The diacetate cobalt is purchased in the form of 5% aqueous solution. The delivery to the plant is done by road tanker and the offloading is made through pipe and pump to the storage tank. From the cobalt storage tank the solution is transferred through a pump as required by the specified process parameters. b) SCC The use of cobalt acetate is strictly kept in enclosed pipes and vessels, throughout the process. During the entire life cycle of cobalt diacetate the process and work conditions are strictly controlled to ensure the minimum risks for persons and environment. To comply with this there are several procedures, Personal Protection Equipment and safety systems that will be implemented. All the activities of manipulation are covered by risk assessment and the necessary measures are taken to prevent the exposure of workers to the chemical. c) Catalyst replacement During the last fifty years the technology has been developed around the use of cobalt acetate. According to the available information there is no suitable alternative to the diacetate cobalt as a catalyst in the PTA industry. As far as we know there is no PTA plant in the world using a different catalyst than this and there is no report of a viable industrial alternative. The effectiveness of cobalt as a catalyst is related to the ease with which forms complexes and particularly to the large variety of ligands in these complexes . d) Inter-changeability Diacetate cobalt was identified as the best cobalt salt to be use in PTA technology. The other forms of cobalt salts have the following problems: • Chloride, sulphates, nitrates and carbonates are poisonous for the palladium hydrogenation catalyst in the purification step;

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			• Chloride ion promotes a secondary reaction which yields an undesirable by-product. • The chloride ion in particular is known as being a corrosion promoter on stainless steel equipments; The solvent on the oxidation process is the acetic acid and the acetate ion is already present in the reaction solution making the choice of acetate cobalt as the best option. e) Uses of PTA PTA can be used in polyester textile application and PET applications. There is no consumer exposure to CoAc in any downstream product of PTA, IPA or DMT manufacture. f) Use specific exemptions Risk management of the use of CoAc is already required and practised under:- ☐ The carcinogens directives - 90/394/EC and 2004/37/EC on the protection of workers from the risks related to exposure to carcinogens or mutagens at work; ☐ The Chemical Agents Directive, 98/24/CE; ☐ Directive 2010/75/EU on industrial emissions (integrated pollution prevention and control); ☐ Directive 96/82/EC on the control of major-accident hazards involving dangerous substances; ☐ Regulation 2011/10/EU on plastic materials and articles intended to come into contact with food – CoAc is listed as a specific additive for food contact plastics.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
984	2011/09/13 14:52 File attached	 Industry or trade association Germany	electroplating and surface treatment
927	2011/09/13 13:12	Dr. Kubitz GmbH Company Germany	It is not possible to find or develop suitable substitutes in the available time.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
916	2011/09/13 12:36 File attached Confidential	Company Germany	We are convinced that the use of aqueous Cobalt(II) diacetate solutions in industrial applications as a catalyst, should be exempted from an eventual authorization requirement for four key reasons: - Based on the existing directives related to carcinogens and chemical agents and their corresponding national legislation, worker exposure to Cobalt(II) diacetate is already effectively regulated on the EU community level. - Exposure to Cobalt(II) diacetate in industrial uses, especially when handled in aqueous solutions, is very limited as it happens in closed continuous processes. - Cobalt(II) diacetate is a critical substance for the European polyester industry as a whole, with two important sites in Germany producing DMT. These sites are already subject to existing regulation that addresses the risks related to Cobalt(II) diacetate. - No viable alternatives have been found, despite several decades of research, so a forced introduction of less selective catalysts would destroy the economic viability of the business.
945	2011/09/13 12:36 File attached Confidential	Company Germany	We are convinced that the use of aqueous Cobalt(II) diacetate solutions in industrial applications as a catalyst, should be exempted from an eventual authorization requirement for four key reasons: - Based on the existing directives related to carcinogens and chemical agents and their corresponding national legislation, worker exposure to Cobalt(II) diacetate is already effectively regulated on the EU community level. - Exposure to Cobalt(II) diacetate in industrial uses, especially when handled in aqueous solutions, is very limited as it happens in closed continuous processes. - Cobalt(II) diacetate is a critical substance for the European polyester industry as a whole, with two important sites in Germany producing DMT. These sites are already subject to existing regulation that addresses the risks related to Cobalt(II) diacetate. - No viable alternatives have been found, despite several decades of research, so a forced introduction of less selective catalysts would destroy the economic viability of the business.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
888	2011/09/13 11:44 File attached	 Company Belgium	
865	2011/09/13 01:01 File attached Confidential	BP Chembel NV Company Belgium	Comments on uses that should be exempted, including reasons for that: The use of cobalt acetate in the manufacture of PTA/IPA & DMT is carried out under strictly controlled conditions (SCC) in line with ECHA Guidance on Intermediates, Version 2 Dec 2010 . Risk management of the use of CoAc is already required and practised under:- ☐ The carcinogens directives - 90/394/EC and 2004/37/EC on the protection of workers from the risks related to exposure to carcinogens or mutagens at work; ☐ The Chemical Agents Directive, 98/24/CE; ☐ Directive 2010/75/EU on industrial emissions (integrated pollution prevention and control); ☐ Directive 96/82/EC on the control of major-accident hazards involving dangerous substances; ☐ Regulation 2011/10/EU on plastic materials and articles intended to come into contact with food – cobalt diacetate is listed as a specific additive for food contact plastics. There is no known consumer or worker exposure to CoAc in any downstream product of PTA, IPA or DMT manufacture Additionally should cobalt diacetate proceed to the Authorisation process under REACH then Research and Development should be exempted from Authorisation. As well as these

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			activities being carried out by skilled and trained personnel such activities would be covered by existing regulations such as the Carcinogens Directive and the Chemical Agents Directive. It is noted that intermediate uses of substances which would be expected to be handled in a similar tightly controlled manner benefit from a generic exemption from Authorisation due to their "intermediate" status under REACH. We consider that given cobalt diacetate is handled under similar tightly controlled conditions catalyst use in industrial processes such as PTA manufacture, specific exemption from Authorisation could be justified for cobalt diacetate if it is still considered of sufficient priority for addition to Annex XIV of the REACH regulation.
841	2011/09/12 19:02 File attached	LKS Kronenberger GmbH Metallveredlungswerk Company Germany	Because of a safety application, properly controlled risks by German laws regulations and according to article 58 (2) we file/demand an exemption of the application of Cobalt(II)-Diacetate in surface treatment processes/galvanic surface treatment technologies.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
830	2011/09/12 17:54	Reactana Katalysatoren und Chemikalien GmbH Company Germany	The use of Cobalt Diacetate as a catalyst for DMT, TPA and IPA should be considered as a candidate for a use-specific exemption to authorization. This should also apply to an production of Cobalt Diacetate in form of aqueous solution, as described unte III. Comments.
799	2011/09/12 16:16	Company United Kingdom	The use of Cobalt diacetate in animal feed falls under the scope of food safety regulation (EC EC 178/2002) and, as such, is exempted from Authorisation. As per REACh legislation (Title 1 – Article 2 – 8b), intermediate uses are exempted from Authorisation. Some specific uses – manufacture of other chemicals (including some wet processes and the use of Cobalt acetate to manufacture certain catalysts) could be exempted. On top of that, CMR compounds are already covered by other legislations including: the Carcinogens Directive 90/394/EEC), Directive 98/24/CE, Directive 2004/37/EC and IPPC directive (Dir. 2008/1/EC) cover already risk management of carcinogens at work.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
797	2011/09/12 16:09 File attached	 Company Spain	In our view the use of cobalt acetate as a catalyst for the manufacture of PTA/PIA/DMT should be exempted from authorisation due to the following considerations: • We accept the classification of cobalt diacetate as reiterated by the ECHA proposal but notes that the carcinogenicity classification is restricted to exposure by the inhalation route. Virtually all cobalt diacetate used as a catalyst in terephthalic acid,(PTA), isophthalic acid (PIA) and dimethylterephthalate (DMT) is handled as a solution in acetic acid which removes the risks of inhalation associated with handling the dry crystallised salt. • It is not a wide-dispersive use , because: o Only less than 450 MT of cobalt acetate are going to be used during 2011 in Europe as catalyst for PTA/PIA/DMT production, which represents 70% to 80% of the use of cobalt diacetate, to manufacture more than 4 M tonnes of those products. o Cobalt acetate as catalyst for these manufacturing processes are only used at some 10 -11 industrial sites in Europe. o Cobalt acetate is handled under tight controlled conditions, equivalent to SCC for intermediates, at specialised petrochemical industrials sites, as a solution in acetic acid in closed systems, which removes the risks of inhalation associated with handling the crystallised salt. Only a very small number of workers are involved in case of potential accidental discharge or leaks, or during maintenance works and always wearing the requested protective equipment recommended by the suppliers MSDS. o Risk management of the use of CoAc is already required and practised under :- ☐ The carcinogens directives - 90/394/EC and 2004/37/EC on the protection of workers from the risks related to exposure to carcinogens or mutagens at work; ☐ The Chemical Agents Directive, 98/24/CE; ☐ Directive 2010/75/EU on industrial emissions (integrated pollution prevention and control); ☐ Directive 96/82/EC on the control of major-accident hazards involving dangerous substances; ☐ Regulation 2011/10/EU on plastic materials and articles intended to come into contact with food – CoAc is listed as a specific additive for food contact plastics o Due to its industrial use the general population exposure is non-existing. The

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			residual levels of cobalt in the PTA product are
744	2011/09/12 11:24	Company France	Automated processes and enclosed systems in surface treatment should be exempted, as well as activities covered by the IED directive.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
720	2011/09/10 17:54	Company Finland	Comments on uses that should be exempted, including reasons for that: We consider the following uses as intermediates and should therefore be exempt: • Manufacturing of Cobalt diasetate • Industrial use of cobalt diacetate in the manufacture of inorganic pigments & frits, glass and ceramic ware • Industrial use of cobalt diacetate in the manufacture of other chemicals • Manufacture of catalyst • Industrial use of cobalt diacetate in surface treatment processes (intermediate use) • Industrial use of cobalt diasetate in the manufacturing of hardmetal powder (Cobalt-Tungsten carbide powder) Authorisation under REACH is not required when a substance is used in food or feeding stuffs in accordance with Regulation (EC) No 178/2002. Use as animal feed additive is also exempt from authorisation (EU 1831/2003). Use of cobalt diacetate as a catalyst is tightly controlled by existing legislation and should therefore be treated in a comparable way to other chemical intermediates i.e. exempted from REACH. Should cobalt diacetate be proposed for addition to Annex XIV we find it justifiable that cobalt diasetate would be considered as a use-specific exemption from the Authorisation requirements

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
691	2011/09/09 15:01 Company Germany		Antrag auf eine Ausnahmeregelung für die Verwendung von Cobalt-II-Salzen gemäß Artikel 58(2) der REACH Verordnung. Artikel 58(2): Verwendungen oder Verwendungskategorien können von der Zulassungspflicht ausgenommen werden, sofern - auf der Grundlage bestehender spezifischer Rechtsvorschriften der Gemeinschaft mit Mindestanforderungen an den Schutz der menschlichen Gesundheit oder der Umwelt bei der Verwendung des Stoffes - das Risiko ausreichend beherrscht wird. Bei der Festlegung derartiger Ausnahmen ist insbesondere die Verhältnismäßigkeit des mit der Art des Stoffes verbundenen Risikos für die menschliche Gesundheit und die Umwelt zu berücksichtigen Entsprechend den europäischen und nationalen Regularien ist gewährleistet, dass die nationale Gesetzeslage in Deutschland eine ausreichende Sicherheit von Mensch und Umwelt garantiert: In der EU ist die Sicherung von Mensch und Umwelt beim Gebrauch von Chromtrioxid und seinen Lösungen gewährleistet durch die konsequente Umsetzung der folgenden gesetzlichen Regelungen: • EG 1907/2006 (REACH-Verordnung) • EG/1272/2008 (GHS-Verordnung) • 2002/95/EG (ROHS) • 2002/96/EG (WEEE) • 196/82/EG (Seveso-II-RL) • 2010/75/EU (IVU) • 2000/60/EG (WRR) • 98/249/EG In Deutschland werden diese Aspekte zusätzlich durch folgende Verordnungen erweitert bzw. umgesetzt: • Chemikaliengesetz • Störfallverordnung • Gefahrstoffverordnung • Bundesimmissionsschutzgesetz • Arbeitsstättenverordnung, ASR

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			• Verordnung zur arbeitsmedizinischen Vorsorge • Arbeitsschutzgesetz • Kreislaufwirtschafts- und Abfallgesetz • Wasserhaushaltsgesetz • Abwasserverordnungen • Verordnung über Anlagen zum Umgang mit wassergefährdenden Stoffen • TrwS, TRGS • Berufsgenossenschaftliche Vorschriften • Betriebssicherheitsverordnung Der sichere Umgang wird wesentlich im Rahmen der Bundes-Immissions-Schutz-Verordnungen (12. BimSchV) und der Störfallverordnung (StöfallV), §§ 8 und 9, geregelt. Einie sichere Handhabung mindestens für die Unternehmen, die den einfachen Pflichten der Störfallverordnung unterliegen, ist bereits gegeben, wie dargestellt. Aus diesen Gründen beantragen wir eine Ausnahmeregelung für die Verwendung von Cobalt-II-Salzen in Passivierungslösungen der galvanischen Oberflächenbeschichtung.
686	2011/09/09 14:47 File attached	Company Germany	We suggest that all steps in the process of using cobalt diacetate in scientific R&D should be exempted from authorization. This should cover the steps starting from manufacture of the substance (exempted already), filling into packages, preparation of formulations till the use as calibration standard for ICP, AAS and MS. The use of these formulations for scientific R&D (< 1t/a) is already exempted. Cobalt diacetate is an important substance for scientific R&D, where it is used as a catalyst. It is used as analytical reagent, e.g. as calibration standard for ICP and AAS in laboratories as well as ISO-certificated laboratories, and in routine analytics. The usage of cobalt diacetate is still state of the art, no alternative methods are available. ISO-certified labs and quality control labs are obliged by governmental organizations (e.g. FDA) to perform the calibration of instruments on a regular basis and therefore, have the need to use cobalt diacetate formulations. It is actually not possible to replace cobalt diacetate in these applications which are described in the ACS. The substance will only be supplied in packages used in laboratories, e.g. small bottles. Cobalt diacetate is used in the laboratory by industrial and professional users that are well-

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			trained. The volume needed for one analysis is minimal. The exemption is required e.g. to secure routine analytics done in laboratories. Therefore, we suggest that not only the use of cobalt diacetate in scientific research and development but also the refilling of the solid material, the preparation of formulations and the filling to supply into these R&D applications should be exempted from authorisation.
679	2011/09/09 13:25	Lotte Chemical UK Ltd Company United Kingdom	As there are currently no available substitutes for cobalt diacetate use as a catalyst in Terephthalic acid manufacture and these are large scale industrial processes no time scale can be foreseen for review periods relating to substitution and as such, we consider that this use should be considered as a candidate for a use-specific exemption from the Authorisation requirement, should cobalt diacetate be proposed for addition to Annex XIV of the REACH regulation.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
644	2011/09/08 18:41	Xstrata Nikkelverk AS Company Norway	The use of cobalt acetate as a catalyst may be considered for special exemption as the tonnage is still relatively small, and the compound is used in liquid form. Inhalation exposure is therefore always going to be limited, especially because the use is always in closed reaction chambers under very strictly controlled conditions.
594	2011/09/07 12:59	Company Germany	In the production process of dimethyl terephthalate (DMT), a polyester precursor, cobalt (II) diacetate is used as a vital catalyst. No viable alternative to this catalyst is known at the moment. The ban of cobalt (II) acetate would mean in practice the end of production and the shut down of the DMT production plant in Steyerberg, Germany. There is no substitution possible for this material (e. g. with a different cobalt salt). Oxxynona GmbH assures that there are no releases of this material to the environment , e.g. through active recycling process of cobalt (II) diacetate. Through the use of personal protective equipment and appropriate technical measures exposure of the workers to this material is excluded. The exposure scenario in the manufacturer's specified limits for dealing with the catalyst of cobalt (II) diacetate are monitored regularly. Cobalt (II) diacetate as a catalyst is used under strictly controlled and strictly confined conditions. Use of cobalt (II) diacetate takes place in industrial sector only. Residues of cobalt (II) diacetate in dimethyl terephthalate are strictly controlled and contained according to waste management measures and send to a registered waste plant. All legal requirements in dealing with carcinogenic substances are strictly controlled.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
			The protection of human and environmental exposure of Oxxynova GmbH is in line with the objectives of the REACH Regulation.
586	2011/09/05 17:31 File attached	Committee Of PET Manufacturers in Europe Industry or trade association Belgium	We believe that the use of cobalt acetate in the manufacture of PTA, IPA and DMT should be exempted from Authorisation for the following reasons: In catalyst use for PTA, IPA and DMT manufacture, cobalt diacetate is handled in closed process equipment under strictly controlled conditions. These operations are only carried out on specialist petrochemical industry industrial sites. Periodic air monitoring shows that airborne cobalt concentrations are below the level of detection and this is much lower than both the exposure data cited in the ECHA/Netherlands documentation and the REACH registration dossier DNEL (40ug/m3). The residual levels of cobalt in the PTA product are
574	2011/09/01 13:38	Umicore NV/SA Company Belgium	According to REACH Title 1, Chapter 1, Article 2, 8b all intermediate uses are exempted from Authorisation. We are therefore of the opinion that all supported uses to which PC19 is assigned (cfr. registration dossier) should be specifically listed as being exempted in the recommendation for prioritisation of ECHA.

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
565	2011/08/30 21:39 File attached Confidential	Cobalt REACH Consortium Ltd (CoRC) Industry or trade association United Kingdom	Use of cobalt dinitrate as an intermediate to manufacture other chemicals is exempt (REACH Title 1, Chapter 1, Article 2, 8b). Specific uses considered as intermediates are listed below: -Manufacture of cobalt diacetate -Industrial use of cobalt diacetate as catalyst (intermediate use) -Industrial use of cobalt diacetate in surface treatment processes (intermediate use) -Industrial use of cobalt diacetate in the manufacture of inorganic pigments & frits, glass and ceramic ware (intermediate use) -Industrial use of cobalt diacetate in the manufacture of chemicals and in other wet-chemical processes as intermediate Authorisation under REACH is not required when a substance is used in food or feeding stuffs in accordance with Regulation (EC) No 178/2002. Use of cobalt diacetate as a catalyst is only performed in a small number of industrial facilities that are already subject to extensive existing community legislation relevant to the control of CMR chemicals in the workplace and release to the environment (IPPC Directive, Pregnant workers Directive, Chemical Agents Directive, Seveso II Directive, Carcinogens Directive). The process is under tightly controlled conditions and emissions are strictly contained during use. See also comments provided under "General Comments". As such, we consider that this use should be considered as a candidate for a use-specific exemption from the Authorisation requirement, should cobalt diacetate be proposed for addition to Annex XIV of the REACH regulation.
514	2011/07/29 17:14	Company Italy	I suggest to exempt cobal diacetate used for synthesis. Exposure is normally very low and it is possible to reduce it using it in solution. We use it to synthetize cobalt dioctanoate. We have already tried to use other precursors, in all case we obtained a cobalt dioctanoate having several drawbackes, probably only with cobalt dicatate it is possible to have a complete substitution

IV - COMMENTS ON USES FOR WHICH REVIEW PERIODS SHOULD BE INCLUDED IN ANNEX XIV, INCLUDING REASONS FOR THAT:

#	Date (Attachment provided)	Submitted by (name, Organisation/MSCA)	Comment
1806	2011/09/14 20:50 File attached	ACEA - European Automobile Manufacturers Association Industry or trade association Belgium	See attachment.
1648	2011/09/14 16:12	Portugal MemberState Portugal	

1526	2011/09/14 13:00 File attached	Enthone GmbH Company United Kingdom	See attached
927	2011/09/13 13:12	Dr. Kubitz GmbH Company Germany	Use in electrolytes for the deposition of cobalt layers intended as scale for magnetic measurements of distances and angles.

916	2011/09/13 12:36 File attached Confidential	Company Germany	none
945	2011/09/13 12:36 File attached Confidential	Company Germany	none
888	2011/09/13 11:44 File attached	Company Belgium	

865	2011/09/13 01:01 File attached Confidential	BP Chembel NV Company Belgium	We acknowledge that ECHA have not proposed review periods for any uses during this prioritisation. Any review period would need to be developed based on a full understanding on the supply/value chain for cobalt diacetate. Such an understanding is not available at present and would only be possible given sufficient time to fully investigate the supply/value chain. We would urge ECHA not to set review periods until suitable robust data are available. In the case of the use of cobalt diacetate as a catalyst in the manufacture of terephthalic acid (PTA), given the scale of resource previously put into research to attempt to identify a replacement for cobalt in this application without success, it is not considered realistic to expect an alternative to emerge in any short to medium timescale. Furthermore, the possibility that no economically feasible alternative exists may also be highly likely. On that basis, no time scale can be reasonably foreseen for review periods relating to substitution.
830	2011/09/12 17:54	Reactana Katalysatoren und Chemikalien GmbH Company Germany	In view of production and use of Cobalt Diacetate Solution over three decades, review periods should at least be 5 years or more.
797	2011/09/12 16:09 File attached	 Company Spain	We acknowledge that ECHA have not proposed review periods for any uses during this prioritisation. Any review period would need to be developed based on a full understanding on the supply/value chain for cobalt diacetate. Such an understanding is not available at present and would only be possible given sufficient time to investigate the supply/value chain further. We would urge ECHA not to set review periods until suitable robust data are available. As there are currently no available substitutes for cobalt diacetate use as a catalyst in Terephthalic acid manufacture and these are large scale industrial processes no time scale can be foreseen for review periods relating to substitution. See also comments provided under "General Comments". As such, we consider that this use should be considered as a candidate for a use-specific exemption from the Authorisation requirement, should cobalt diacetate be proposed for addition to Annex XIV of the REACH regulation.

744	2011/09/12 11:24	Company France	Sealing of aluminium in anodization process.
732	2011/09/12 10:11	Company Spain	We acknowledge that ECHA have not proposed review periods for any uses during this prioritisation. Any review period would need to be developed based on a full understanding on the supply/value chain for cobalt diacetate. Such an understanding is not available at present and would only be possible given sufficient time to investigate the supply/value chain further. We would urge ECHA not to set review periods until suitable robust data are available. As there are currently no available substitutes for cobalt diacetate use as a catalyst in Terephthalic acid manufacture and these are large scale industrial processes no time scale can be foreseen for review periods relating to substitution. See also comments provided under "General Comments". As such, we consider that this use should be considered as a candidate for a use-specific exemption from the Authorisation requirement, should cobalt diacetate be proposed for addition to Annex XIV of the REACH regulation.
720	2011/09/10 17:54	Company Finland	Comments on uses for which review periods should be included in Annex XIV, including reasons for that: As there are currently no available substitutes for cobalt diacetate use as a catalyst in manufacturing of terephthalic acid (PTA), dimethyl terephthalate (DMT) and isophthalic acid (IPA). It is our understanding that for these are large scale industrial processes no time scale can be foreseen for review periods relating to substitution. We consider that this use should be considered as a use-specific exemption from the Authorisation requirement in case cobalt diasetate is proposed for addition to Annex XIV of the REACH regulation.

679	2011/09/09 13:25	Lotte Chemical UK Ltd Company United Kingdom	LCUK acknowledge that ECHA have not proposed review periods for any uses during this prioritisation. Any review period would need to be developed based on a full understanding on the supply/value chain for cobalt diacetate. Such an understanding is not available at present and would only be possible given sufficient time to investigate the supply/value chain further. We would urge ECHA not to set review periods until suitable robust data are available. As there are currently no available substitutes for cobalt diacetate use as a catalyst in Terephthalic acid manufacture and these are large scale industrial processes no time scale can be foreseen for review periods relating to substitution. See also comments provided under "General Comments". As such, we consider that this use should be considered as a candidate for a use-specific exemption from the Authorisation requirement, should cobalt diacetate be proposed for addition to Annex XIV of the REACH regulation.
586	2011/09/05 17:31 File attached	Committee Of PET Manufacturers in Europe Industry or trade association Belgium	We acknowledge that ECHA have not proposed review periods for any uses during this prioritisation. Any review period would need to be developed based on a full understanding on the supply/value chain for cobalt diacetate. Such an understanding is not available at present and would only be possible given sufficient time to investigate the supply/value chain further. We would urge ECHA not to set review periods until suitable robust data are available. As there are currently no available substitutes for cobalt diacetate use as a catalyst in Terephthalic acid manufacture and these are large scale industrial processes no time scale can be foreseen for review periods relating to substitution. See also comments provided under "General Comments". As such, we consider that this use should be considered as a candidate for a use-specific exemption from the Authorisation requirement, should cobalt diacetate be proposed for addition to Annex XIV of the REACH regulation.

565	2011/08/30 21:39 File attached Confidential	Cobalt REACH Consortium Ltd (CoRC) Industry or trade association United Kingdom	We acknowledge that ECHA have not proposed review periods for any uses during this prioritisation. Any review period would need to be developed based on a full understanding on the supply/value chain for cobalt diacetate. Such an understanding is not available at present and would only be possible given sufficient time to investigate the supply/value chain further. We would urge ECHA not to set review periods until suitable robust data are available. As there are currently no available substitutes for cobalt diacetate use as a catalyst in Terephthalic acid manufacture and these are large scale industrial processes no time scale can be foreseen for review periods relating to substitution. See also comments provided under "General Comments". As such, we consider that this use should be considered as a candidate for a use-specific exemption from the Authorisation requirement, should cobalt diacetate be proposed for addition to Annex XIV of the REACH regulation.