

***Case No COMP/M.7584 -  
INTERNATIONAL  
CHEMICAL  
INVESTORS / INEOS  
CHLOROVINYLS  
BUSINESS***

Only the English text is available and authentic.

**REGULATION (EC) No 139/2004  
MERGER PROCEDURE**

---

Article 6(1)(b) NON-OPPOSITION  
Date: 09/06/2015

***In electronic form on the EUR-Lex website under  
document number 32015M7584***



Brussels, 09.06.2015  
C(2015) 4055 final

In the published version of this decision, some information has been omitted pursuant to Article 17(2) of Council Regulation (EC) No 139/2004 concerning non-disclosure of business secrets and other confidential information. The omissions are shown thus [...]. Where possible the information omitted has been replaced by ranges of figures or a general description.

*COMP Operations*

PUBLIC VERSION

MERGER PROCEDURE

**To the notifying party:**

Dear Sir/Madam,

**Subject: Case M.7584 - International Chemical Investors / INEOS Chlorovinyls Business**  
**Commission decision pursuant to Article 6(1)(b) of Council Regulation No 139/2004<sup>1</sup> and Article 57 of the Agreement on the European Economic Area<sup>2</sup>**

- (1) On 29 April 2015, following a referral pursuant to Article 4(5) of the Merger Regulation, the European Commission received notification of a proposed concentration pursuant to Article 4 of the Merger Regulation by which International Chemical Investors Group S.E. ("ICIG", Luxembourg) acquires within the meaning of Article 3(1)(b) of the Merger Regulation control of a chlorovinyls business (the "Chlorovinyls Business" or the "Target") previously owned and operated by INEOS Group AG ("INEOS", Switzerland), by way of purchase of shares (the "Transaction").<sup>3</sup> ICIG is hereinafter referred to as the "Notifying Party", and together with INEOS as the "Parties".

---

<sup>1</sup> OJ L 24, 29.1.2004, p. 1 ('the Merger Regulation'). With effect from 1 December 2009, the Treaty on the Functioning of the European Union ('TFEU') has introduced certain changes, such as the replacement of 'Community' by 'Union' and 'common market' by 'internal market'. The terminology of the TFEU will be used throughout this decision.

<sup>2</sup> OJ L 1, 3.1.1994, p.3 ("the EEA Agreement").

<sup>3</sup> Publication in the Official Journal of the European Union No C 156, 12.05.2015, p. 9..

## 1. THE PARTIES AND THE OPERATION

- (2) ICIG is a privately owned industrial holding company, active worldwide in agrochemicals, fine chemicals, basic chemicals, performance chemicals, finished dose pharmaceuticals and pharmaceutical ingredients.
- (3) The Target comprises assets for the production and supply of S-PVC and other related products, such as caustic potash (“KOH”), chlorine, ethylene dichloride (“EDC”), Vinyl Chloride Monomer (“VCM”), caustic soda, hydrochloric acid and sodium hypochlorite located in Belgium, France, Germany, the Netherlands and the United Kingdom. INEOS is the parent of a group of companies which are active in the manufacture of petrochemicals, specialty chemicals and oil products.
- (4) The Transaction originates from the commitments entered into by INEOS and Solvay SA (“Solvay”) in the context of the Commission’s merger review of the combination of INEOS’ and Solvay’s EEA chlorovinyls activities and related businesses into a full-function joint venture, INOVYN, in Case M.6905 *INEOS / Solvay / JV*.<sup>4</sup> The creation of INOVYN was cleared by the Commission on 8 May 2014 subject to the up-front divestment of a number of INEOS’ chlorovinyl activities.
- (5) In particular, INEOS committed to divest three S-PVC plants (Wilhelmshaven in Germany, Mazingarbe in France and Beek Geleen in the Netherlands), as well as various production facilities for chemical substances on the upstream levels of the multi-level PVC production value chain up to the manufacture of chlorine at Tessenderlo in Belgium and Runcorn in the United Kingdom. These activities are now being acquired by ICIG along with part of INEOS’ KOH business at Tessenderlo.
- (6) On 14 November 2014, a Share Purchase Agreement (“SPA”) was agreed between ICIG and INEOS. In the context of the Commission’s review of ICIG as the proposed purchaser of the divestment business in Case M.6905, certain amendments were made to the original SPA. The SPA was complemented by a set of ancillary agreements as foreseen by the commitments in case M.6905, and is also accompanied by additional agreements relating to the transfer of part of INEOS’ KOH business to ICIG. On 3 June 2015, ICIG and INEOS submitted an amended SPA which took into account and incorporated these modifications and additional agreements (the “Amended SPA”).
- (7) Under the Amended SPA, ICIG will toll manufacture a certain volume of KOH for INOVYN at the Tessenderlo plant, while retaining the right to use all the remaining capacity (the “KOH Toll Agreement”).<sup>5</sup> The KOH Toll Agreement is currently due to expire [...]. By this date, ICIG will have had to decide to either shut down the Tessenderlo KOH plant or invest in conversion plans, as the industry is phasing out the older mercury electrolysis technology due to environmental concerns.<sup>6</sup>
- (8) In addition, in the context of the purchaser approval process in Case M.6905, ICIG has pledged to [summary of the terms of the Independent Promise of Guarantee].

---

<sup>4</sup> Case M.6905 *INEOS / Solvay / JV* of 8 May 2014.

<sup>5</sup> More in detail, ICIG will own the KOH Tessenderlo plant and related infrastructure, but will toll manufacture KOH liquid for INOVYN [...] (as 100% KOH) per annum (Form CO, paragraph 89).

<sup>6</sup> See also Case M.6905 – *INEOS / Solvay / JV*, footnote 58 and paragraph 460.

(9) ICIG has formalised this pledge by means of an “Independent Promise of Guarantee” under German law (*selbständiges Garantieversprechen*) entered into with Baker Tilly, the Monitoring Trustee, on the basis of a Trustee Mandate submitted to the Commission on 29 May 2015.

(10) As a result of the Transaction, ICIG will exercise sole control over the Target.

## **2. EU DIMENSION**

(11) The Transaction does not meet either of the alternative jurisdictional thresholds under Article 1 of the Merger Regulation, because the combined aggregate worldwide turnover of all the undertakings concerned in 2014 does not exceed EUR 2 500 million (EUR [...] for ICIG; EUR [...] for the Target).<sup>7</sup> The Transaction therefore has no EU dimension, but was referred to the Commission pursuant to a referral request under Article 4(5) of the Merger Regulation.

## **3. MARKET DEFINITION**

(12) The Transaction results in a number of minor horizontal overlaps and vertical relationships as regards chlorine, caustic soda, hydrochloric acid and sodium hypochlorite, but none of these give rise to affected markets and, therefore, is not assessed further in this Decision. In addition, post-Transaction ICIG would become INEOS' [...] supplier of chlorine, which is used by INEOS for producing chlorotoluenes. While both INEOS and ICIG are active in chlorotoluenes, the Target is not. Therefore, the Transaction does not lead to any horizontal or vertical relationship as regards chlorotoluenes, which are not assessed further in this Decision.<sup>8</sup>

(13) As noted above, post-Transaction ICIG would be entitled to use the remaining capacity of the KOH plant at Tessenderlo, and would take over a set of customer contracts, currently part of INEOS' portfolio, equivalent to around [...]% of INEOS' total KOH business. Given that ICIG is already active in KOH through its plant at Thann (France), the Transaction gives rise to a horizontal overlap and potentially a number of affected markets in KOH. The remainder of this Decision will therefore focus on this horizontal overlap.

### **3.1. Product Market Definition**

(14) KOH is produced from the electrolysis of potassium chloride, a process that creates chlorine as a co-product. KOH is either sold in liquid form as a 50% solution in water,

---

<sup>7</sup> Turnover calculated in accordance with Article 5 of the Merger Regulation.

<sup>8</sup> The Transaction would be unlikely to increase the risk of coordination between INEOS and ICIG at the level of chlorotoluenes as: (i) INEOS and ICIG are active in the production of different chlorotoluenes, with the exception of [substituted chlorotoluene A] and [substituted chlorotoluene B]; (ii) INEOS and ICIG face intense competition from Asian producers in [substituted chlorotoluene A] and [substituted chlorotoluene B], and chlorotoluenes customers confirmed that they would be ready to increase their purchases from Asia in the event of price increases in [substituted chlorotoluene A] and [substituted chlorotoluene B] in the EEA; (iii) chlorine does not appear to be an important input in the production of [substituted chlorotoluene A] and [substituted chlorotoluene B]; and in any event (iv) ICIG is already supplying INEOS with [mono-substituted chlorotoluene], which is a necessary input for the production of [substituted chlorotoluene A] and [substituted chlorotoluene B]. The Transaction would not, therefore, increase ICIG's visibility over the volumes of [substituted chlorotoluene A] and [substituted chlorotoluene B] sold by INEOS.

i.e. liquid KOH (also referred to as lye) or is sold in a solid form (also referred to as flakes). KOH flakes are produced from liquid KOH by heating the liquid at a high temperature to evaporate out the water content (around 10% of the content of KOH flakes is water which cannot be evaporated).

- (15) Overall, the majority of KOH is used for conversion into potassium carbonates (30%), potassium phosphates (16%) and other chemicals such as organic and inorganic potassium salts, including de-icers (19%). The production of soaps / detergents (11%) and fertiliser (6%) constitute two other major applications for KOH.
- (16) From a demand-side perspective, the Notifying Party submits that, while the Commission has never assessed the market for KOH, this latter bears significant similarities to the Commission's decisional practice regarding liquid and solid caustic soda.<sup>9</sup> This is because liquid KOH and KOH flakes (i) are typically used for different end-applications; (ii) customers generally purchase either one or the other but not both; and (iii) only a few customers have the ability to store both types of caustic soda.
- (17) From a supply-side perspective, the Notifying Party explains that KOH flakes are more expensive to produce due to the costs of evaporating the liquid content and the additional packaging required. Not all producers have the necessary equipment on-site to undertake the necessary evaporation and packaging needed to sell KOH flakes. This equipment is highly specialised and energy-intensive. The Notifying Party submits that according to its experience the additional energy and bagging costs add approximately [...] % to the variable costs of producing liquid KOH.
- (18) Accordingly, the Notifying Party submits that liquid KOH and KOH flakes belong to two distinct product markets.
- (19) The results of the market investigation are broadly in line with the Notifying Party's submissions. While a limited number of customers appear to be able to procure KOH flakes and then produce liquid KOH themselves, such in-house production of liquid KOH from flakes requires certain specific production facilities and know-how.<sup>10</sup> Moreover, a very large majority of customers indicated that they cannot replace liquid KOH with KOH flakes in their internal production processes without incurring significant costs.<sup>11</sup> By the same token, suppliers also generally pointed out that switching production between liquid KOH and KOH flakes cannot be done in a reasonable timeframe and without incurring significant costs.<sup>12</sup>
- (20) In light of the above, the Commission concludes that, for the purpose of this Decision, liquid KOH and KOH flakes belong to distinct product markets. Given that the Target is not active in KOH flakes, the remainder of this Decision will focus on liquid KOH.

---

<sup>9</sup> See e.g. Commission Decision of 8 May 2014, M.6905 *INEOS/Solvay/JV*, paragraph 475; and Commission Decision of 30 January 2008, M.4734 *INEOS/Kerling*, nos. 33 – 34.

<sup>10</sup> See minutes of conference call with [Customer].

<sup>11</sup> Questionnaire Q1 (customers), question 8.

<sup>12</sup> Questionnaire Q2 (competitors), question 10.

### 3.2. Geographic market definition

- (21) As regards the geographic scope of the market for liquid KOH, the Notifying Party submits that this is likely to be national or regional. In principle, due to the high water content of liquid KOH, transport of liquid KOH by road truck is cost-competitive only for distances of up to 300-400 km. Proximity is a key competitive driver in the market because security of supply and short supply chains are generally of great importance for customers. Empirically, this would be reflected in the trend according to which suppliers tend to have a high market share in the country where their plant is located compared with other countries where they also make sales.
- (22) However, the Notifying Party also explains that some regions in the EEA are subject to competitive dynamics that are distinct from those displayed in continental Europe. In the Nordic (Denmark, Finland, Norway and Sweden) and the United Kingdom / Ireland regions, there is no local KOH production, and therefore liquid KOH is imported from continental Europe via sea transport over distances larger than 300-400 km.
- (23) Moreover, demand conditions are markedly different in the Nordic region. This is partly due to seasonal factors because a number of customers use KOH liquid for the production of de-icers during the winter months. The Nordic region is also relatively large compared to certain other continental regions because KOH is used as an input for drilling fluids, for which there is a demand in the Norwegian oil fields.
- (24) Finally, the Notifying Party submits that these differences in competitive dynamics have a significant effect on price levels for liquid KOH in different regions in the EEA. In particular, the United Kingdom/Ireland region has appreciably different prices: based on its 2014 sales, INEOS achieved an average net invoice value of EUR [...] per tonne of KOH liquid in the United Kingdom and EUR [...] per tonne in Ireland, compared to EUR [...] per tonne in Belgium, EUR [...] in the Netherlands and EUR [...] in France.
- (25) According to the Commission Notice on the definition of relevant market for the purposes of Community competition law (“Market Definition Notice”)<sup>13</sup> the relevant geographic market comprises:

*“the area in which the undertakings concerned are involved in the supply and demand of products or services, in which the conditions of competition are sufficiently homogeneous and which can be distinguished from neighbouring areas because the conditions of competition are appreciably different in those areas.”<sup>14</sup>*

- (26) The market investigation has provided strong indications suggesting that the market for liquid KOH is wider than national, and at least regional in scope.<sup>15</sup> Market participants largely considered that while national borders do not constitute an obstacle to KOH trade, transport costs have a significant impact on the final price of liquid KOH

---

<sup>13</sup> Commission Notice on the definition of relevant market for the purpose of Community competition law, OJ C 372, 9.12.1997, p. 5-13.

<sup>14</sup> Market Definition Notice, paragraph 7.

<sup>15</sup> Questionnaire Q1 (customers), question 10.

and security of supply is a very important factor in the customers' sourcing strategy.<sup>16</sup> These factors are generally associated with short supply chains to streamline logistics and reduce costs.

- (27) While market participants generally agreed that selling over large distances make the price of liquid KOH less attractive, there was no consensus as to what specific distance would constitute an insurmountable barrier. This is because customers located in the area comprising Benelux, France and Germany generally enjoy access to several suppliers. Customers located in the Nordic region appear instead to have more limited sourcing options due to the lack of local suppliers. By the same token, suppliers of liquid KOH consider a number of factors when planning their strategy such as proximity of customers, customer-specific requirements, number of competitors in a given area, as well as their own cost-base.<sup>17</sup>
- (28) Based on the results of the market investigation and the Notifying Party's submissions, it appears that different regions across the EEA display different competitive dynamics. For this reason, the EEA could be split between a North West European region ("NWE"),<sup>18</sup> or even a narrower continental region ("Continental NWE"),<sup>19</sup> distinct from surrounding regions such as the Nordic, the United Kingdom / Ireland, the Southern and the Eastern European regions.
- (29) In light of the above, the Commission concludes that, for the purposes of this Decision, the scope of market for liquid KOH is wider than national, and at least regional in scope. The question as to whether this market should be split between NWE or Continental NWE and their surrounding regions can be left open, as the Transaction does not raise serious doubts under any of those alternative market definitions.

#### **4. COMPETITIVE ASSESSMENT**

- (30) As noted above, the Commission will analyse whether the Transaction is likely to give rise to serious doubts in the market for liquid KOH under several geographic dimensions. This analysis will be centred on Continental NWE and NWE, as those regions constitute the main area of focus of ICIG's and INEOS' KOH businesses and the geographic region where the bulk of the EEA capacity is located. The impact of the transaction on possible markets for liquid KOH in Easter Europe and Southern Europe will not be discussed in this Decision, given that these possible markets would not be affected.

##### **4.1. Non-coordinated effects**

- (31) From a structural point of view, the Transaction would fundamentally lead to a de-concentration because a share of assets and customers would be transferred from INEOS to ICIG.

---

<sup>16</sup> Questionnaire Q1 (customers), questions 11 and 27.

<sup>17</sup> Questionnaire Q2 (competitors), question 16.

<sup>18</sup> Belgium, Luxembourg, Netherlands, Denmark, France, Germany, Ireland, Sweden, Norway and the United Kingdom.

<sup>19</sup> Belgium, Luxembourg, Netherlands, France and Germany.

- (32) The Commission considers that, as a result of the Transaction, ICIG would expand its market share and acquire a platform with which it could better compete with INOVYN. The transfer of (i) customer and distributor contracts; (ii) the necessary sales personnel located across Europe; and (iii) better logistics will enable ICIG to obtain a much larger share in all possible affected markets in a much shorter period than it could otherwise achieve. ICIG would also have the necessary purchasing expertise at Tessenderlo for procurement of the key raw material for KOH production, KCl salt, in addition to its own experts at ICIG's plant in France. Finally, the Transaction would likely result in cost savings for ICIG on KCl purchases as it would be able to purchase KCl on a combined basis for its operations at both Tessenderlo and Thann.
- (33) In addition, the Commission considers that strong incentives exist for ICIG to convert the the Tessenderlo plant so as to continue serving the customers captured during the period following completion of the Transaction and prior to closure of the Tessenderlo mercury cell room.<sup>20</sup> In this regard, the Commission notes that the Independent Promise of Guarantee entered into by ICIG ensures that the Target will have significant resources at its disposal, which would increase the likelihood of a conversion of the Tessenderlo plant. The Commission considers therefore that the Independent Promise of Guarantee constitutes a factual element that the Commission must take into account in this case - along with all the other elements in its file - in its assessment of the impact of the Transaction on the market for liquid KOH.<sup>21</sup>
- (34) Lastly, based on the market investigation, the Commission notes that switching does not generally entail a lengthy and costly process, most customers being able to switch in a few months incurring relatively limited expenditure.<sup>22</sup> While customers emphasised that, in most cases, their number of alternative suppliers is limited, the Transaction would strengthen an existing player, giving ICIG additional capacity and facilities at the heart of Europe.
- (35) The specific effects of the Transaction with respect to each of the possible markets identified in Section 3 of this Decision are discussed in the sections below.

#### 4.1.1. *Continental NWE market for liquid KOH*

- (36) Table 1 below shows the effects of the de-concentration brought about by the Transaction in Continental NWE. As it can be seen, INEOS' market share would decrease from [30-40]% to [10-20]%, while ICIG's market share would increase from [10-20]% to [30-40]%.

---

<sup>20</sup> ICIG will complete its conversion to membrane technology in Thann in Q3 or Q4 2015.

<sup>21</sup> In this respect, it should be pointed out that, as is the case for any information which is material to the Commission's declaration of compatibility of a concentration, the Commission may be entitled to revoke the present decision pursuant to Article 6(3)(a) of the Merger Regulation, should ICIG fail to respect the measures set out in the Independent Promise of Guarantee.

<sup>22</sup> Questionnaire Q1 (customers), question 26.



**Table 1: Liquid KOH market shares in Continental NWE  
by Sales Volumes in 2014**

	Pre-Transaction		Post-Transaction	
	Volume (dry kt)	Share	Volume (dry kt)	Share
<i>INEOS</i>	[...]	[30-40]%	[...]	[10-20]%
<i>ICIG</i>	[...]	[10-20]%	[...]	[30-40]%
Evonik	[...]	[30-40]%	[...]	[30-40]%
Altair	[...]	[5-10]%	[...]	[5-10]%
Spolchemie	[...]	[5-10]%	[...]	[5-10]%
SPCH	[...]	[0-5]%	[...]	[0-5]%
Ercros	[...]	[0-5]%	[...]	[0-5]%
Importers	[...]	[0-5]%	[...]	[0-5]%
<b>Total</b>	[...]	<b>100%</b>	[...]	<b>100%</b>

*Source: Form CO, Annex 7.4*

- (37) This de-concentration is also reflected in a reduction in market concentration as shown by the Herfindahl-Hirschman Index (“HHI”). In Continental NWE, the pre-Transaction HHI is 2 637, which would then be reduced to 2 358, with a negative delta of -279.
- (38) At capacity level, the Transaction would also translate into a de-concentration. Table 2 shows that INEOS would shift from [40-50]% to [20-30]%, while ICIG would shift from [10-20]% to [30-40]%. In this case, the Commission considers that an analysis of capacity levels is all the more relevant because sales volumes are ultimately the result of the assignment of customer contracts to ICIG, and may change significantly following completion of the Transaction.

**Table 2: Liquid KOH market shares in Continental NWE  
by Capacity in 2014**

	Pre-Transaction		Post-Transaction	
	Volume (dry kt)	Share	Volume (dry kt)	Share
INEOS	[...]	[40-50]%	[...]	[20-30]%
ICIG	[...]	[10-20]%	[...]	[30-40]%
SPCH	[...]	[0-5]%	[...]	[0-5]%
Evonik	[...]	[20-30]%	[...]	[20-30]%
BASF <sup>23</sup>	[...]	[10-20]%	[...]	[10-20]%
<b>Total</b>	[...]	<b>100%</b>	[...]	<b>100%</b>

*Source: Form CO, page 58*

(39) In sum, while INEOS' market position will decrease post-Transaction, ICIG will become a more significant player. Absent the Transaction, INEOS (and most likely in the future, INOVYN) would retain 100% of the capacity of the KOH plant at Tessenderlo, and would likely also retain its strong market position.

(40) Post-Transaction, ICIG will face significant competitive pressure from a number of players. In Continental NWE, besides the former market leader INEOS ([10-20]% by sales volume and [20-30]% by capacity), ICIG would compete with other large suppliers such as Evonik ([30-40]% by sales volume and [20-30]% by capacity), as well as a number of other non-negligible players such as Altair, Spolchemie, Ercros and SPCH. Even though these three competitors have their capacity located outside (Continental) NWE, as shown in Table 1, they have a combined market share of [10-20]% in Continental NWE by sales volume: [5-10]% Altair (Italy), [0-5]% Ercros (Spain), and [5-10]% Spolchemie (the Czech Republic). In addition, the general considerations outlined in Section 4.1 also apply with regard to this possible market.

(41) In the light of the above, the Commission concludes that the Transaction is unlikely to give rise to non-coordinated effects in the Continental NWE market for liquid KOH.

#### 4.1.2. NWE market for liquid KOH

(42) Table 3 below shows the effects of the de-concentration brought about by the Transaction in NWE. As it can be seen, INEOS' market share would decrease from [40-50]% to [20-30]%, while ICIG's market share would increase from [5-10]% to [20-30]%.

---

<sup>23</sup> BASF does not currently make any merchant market sales of KOH liquid: it uses all of its KOH liquid production captively.

**Table 3: Liquid KOH market shares in NWE  
by Sales Volumes in 2014**

	Pre-Transaction		Post-Transaction	
	Volume (dry kt)	Share	Volume (dry kt)	Share
INEOS	[...]	[40-50]%	[...]	[20-30]%
ICIG	[...]	[5-10]%	[...]	[20-30]%
Evonik	[...]	[20-30]%	[...]	[20-30]%
Altair	[...]	[5-10]%	[...]	[5-10]%
Spolchemie	[...]	[5-10]%	[...]	[5-10]%
SPCH	[...]	[0-5]%	[...]	[0-5]%
Ercros	[...]	[0-5]%	[...]	[0-5]%
Importers	[...]	[0-5]%	[...]	[0-5]%
<b>Total</b>	[...]	<b>100%</b>	[...]	<b>100%</b>

*Source: Form CO, Annex 7.4*

- (43) The de-concentration is also reflected in the reduction in market concentration, as shown by HHI index. In NWE, the pre-Transaction HHI is 2 930, which would then be reduced to 2 295, with a negative delta of -635.
- (44) At capacity level, the Transaction would also translate into a de-concentration, as shown in Table 2 as there is no additional production capacity located in the additional countries comprising NWE.
- (45) Post-Transaction, ICIG would continue to face significant competitive pressure from a number of players. In NWE, besides the former market leader INEOS ([20-30]%), ICIG would compete with another large supplier, Evonik ([20-30]%), as well as with a number of other non-negligible players such as Altair, Spolchemie, SPCH and Ercros. In addition, the general considerations outlined in Section 4.1 also apply with regard to this possible market.
- (46) Therefore, the Commission concludes that the Transaction is unlikely to give rise to non-coordinated effects in the NWE market for liquid KOH.

#### 4.1.3. Nordic market for liquid KOH

- (47) Table 4 below shows the effects of the de-concentration brought about by the Transaction in the Nordic market for liquid KOH. As it can be seen, INEOS' market share would decrease from [70-80]% to [50-60]%, while ICIG's market share would increase from [5-10]% to [20-30]%.

**Table 4: Liquid KOH Market Shares in the Nordic Market  
by Sales Volumes in 2014**

	Pre-Transaction		Post-Transaction	
	Volume (dry kt)	Share	Volume (dry kt)	Share
INEOS	[...]	[70-80]%	[...]	[500-60]%
ICIG	[...]	[5-10]%	[...]	[20-30]%
Evonik	[...]	[10-20]%	[...]	[10-20]%
Spolchemie	[...]	[5-10]%	[...]	[5-10]%
Altair	[...]	[0-5]%	[...]	[0-5]%
Ercros	[...]	[0-5]%	[...]	[0-5]%
SPCH	[...]	[0-5]%	[...]	[0-5]%
Importers	[...]	[0-5]%	[...]	[0-5]%
<b>Total</b>	[...]	<b>100%</b>	[...]	<b>100%</b>

*Source: Form CO, Annex 7.4*

- (48) The de-concentration is also reflected in the reduction in market concentration, as shown by HHI index. In the Nordic Region, the pre-Transaction HHI is 5 704, which would then be reduced to 4 087, with a negative delta of -1 617.
- (49) Post-Transaction, ICIG will become a much more significant competitive force in this market than in the past, with a market share increasing from [5-10]% to [20-30]%. It will be therefore able to exercise more competitive pressure on INEOS, the market leader, than in the absence of the transaction. In addition, ICIG would compete with other two suppliers, Evonik ([10-20]%) and Spolchemie ([5-10]%). The general considerations outlined in Section 4.1 would also apply with regard to this possible market. Given that, no capacity is located in the Nordic region, Table 2 constitutes the best proxy with respect to the impact of the Transaction on capacity in this market.
- (50) In the light of this, the Commission concludes that the Transaction is unlikely to give rise to non-coordinated effects in the Nordic market for liquid KOH.

*4.1.4. United Kingdom / Ireland market for liquid KOH*

- (51) Table 5 below shows the effects of the de-concentration brought about by the Transaction in the United Kingdom / Ireland market for liquid KOH. As it can be seen, INEOS' market share would decrease from [70-80]% to [60-70]%, while ICIG's market share would increase from [0-5]% to [10-20]%.

**Table 5: Liquid KOH market shares in the United Kingdom / Ireland Market  
by Sales Volumes in 2014**

	Pre-Transaction		Post-Transaction	
	Volume (dry kt)	Share	Volume (dry kt)	Share
INEOS	[...]	[70-80]%	[...]	[60-70]%
ICIG	[...]	[0-5]%	[...]	[10-20]%
SPCH	[...]	[10-20]%	[...]	[10-20]%
Evonik	[...]	[5-10]%	[...]	[5-10]%
Altair	[...]	[5-10]%	[...]	[5-10]%
Ercros	[...]	[0-5]%	[...]	[0-5]%
Spolchemie	[...]	[0-5]%	[...]	[0-5]%
Importers	[...]	[0-5]%	[...]	[0-5]%
Total	[...]	100%	[...]	100%

*Source: Form CO, Annex 7.4*

- (52) The de-concentration is also reflected in the reduction in market concentration, as shown by HHI index. In the United Kingdom / Ireland, the pre-Transaction HHI is 5 596, which would then be reduced to 4 089, with a negative delta of -1 507.

Post-Transaction, ICIG will become a much more significant competitive force in this market than in the past, with a market share increasing from [0-05]% to [10-20]%. It will be therefore able to exercise more competitive pressure on INEOS, the market leader, than in the absence of the transaction. In addition, ICIG would compete with three other suppliers, SPCH ([10-20]%), Evonik ([5-10]%) and Altair ([5-10]%). The general considerations outlined in Section 4.1 would also apply with regard to this possible market. Given that, no capacity is located in the United Kingdom / Ireland, Table 2 constitutes the best proxy with respect to the impact of the Transaction on capacity in this market.

- (53) In the light of this, the Commission concludes that the Transaction is unlikely to give rise to non-coordinated effects in the United Kingdom / Ireland market for liquid KOH.

#### **4.2. Coordinated effects**

- (54) According to the case law of the European Courts and the Guidelines on the assessment of horizontal mergers under the Council Regulation on the control of

concentrations between undertakings (“Merger Horizontal Guidelines”),<sup>24</sup> coordination is most likely to emerge in markets where it is relatively simple to reach a common understanding on the terms of coordination. Three conditions have to be met for coordination to be sustainable: (i) the coordinating firms must be able to monitor to a sufficient degree whether the terms of coordination are being adhered to; (ii) discipline requires that there is some form of credible deterrent mechanism that can be activated if deviation is detected; and (iii) the reactions of outsiders, such as current and future competitors not participating in the coordination, as well as customers, should not be able to jeopardise the results expected from the coordination.

(55) In this light, and even if the Transaction does not reduce the number of players active in the relevant market, the Commission notes that the Transaction creates a certain degree of symmetry in capacity shares, as shown in Table 2 for Continental NWE. Moreover, the KOH Toll Agreement creates a link between INEOS and ICIG in the market for liquid KOH.

(56) Based on the Notifying Party’s submission and the results of the market investigation, and for the reasons set out in the assessment in the following sections, the Commission considers that the market for liquid KOH does not display the characteristics required for coordinated effects to take place. In addition, the Commission has reviewed the KOH Toll Agreement and the proposed mechanism for transferring customer contracts to ICIG, and has reached the conclusion that such transaction structure, in the specific circumstances of the case, does not increase the likelihood of coordination.

#### 4.2.1. *KOH prices are not transparent*

(57) The Commission notes that pricing and volumes in the market for liquid KOH do not appear to be transparent. As submitted by the Notifying Party, this market is characterised by short-term, bilateral negotiations, which generally remain confidential between the supplier and customer. Negotiations typically take place quarterly, regardless of the exact duration of a given contract, and customers are in principle free to source their requirements from a different supplier if a given negotiation is not satisfactory.<sup>25</sup>

(58) In addition, the Commission notes that market for liquid KOH does not feature an index to which prices in contracts and negotiations are generally benchmarked. Although a benchmark price does exist and is published by IHS, many market participants either do not calculate prices by reference to that benchmark price or use it only for internal purposes to have a better understanding of market dynamics before negotiations.<sup>26</sup> In this regard, it is worth noting that neither INEOS nor ICIG make reference to the IHS benchmark in any of their KOH sales contracts or negotiations with customers.<sup>27</sup>

---

<sup>24</sup> Guidelines on the assessment of horizontal mergers under the Council Regulation on the control of concentrations between undertakings, OJ C 31, 5.2.2004, p. 5-18.

<sup>25</sup> Questionnaire Q1 (customers), question 24. See also minutes of conference call with [Customer].

<sup>26</sup> Questionnaire Q1 (customers), question 23. See also minutes of conference calls with [Customer], [Customer]. and [Customer].

<sup>27</sup> Form CO, paragraph 169.

(59) The Notifying Party further substantiated its arguments regarding the lack of transparency with an analysis showing that there is also a wide dispersion in the actual prices paid by liquid KOH customers, both between customers in a given geographic market and between national markets.

(60) In view of the above, the Commission concludes that prices in the market for liquid KOH are not transparent.

#### 4.2.2. *Demand and supply for KOH are not stable*

(61) The market investigation confirmed that demand for KOH tends to fluctuate during one year, essentially due to the use of KOH in de-icing liquids. Depending on weather conditions in a given year, demand for de-icing liquids, and therefore for KOH, may suddenly and substantially change. These changes are caused by factors which are out of the suppliers' control.

(62) In addition, the Commission notes that the market for liquid KOH is currently going through a major transformation, as suppliers face regulatory obligations to phase out the old mercury technology used for electrolysis and convert their plants into the newer membrane technology over the next few years.<sup>28</sup> As noted by the Notifying Party, in the run up to and after 2017 there will be substantial volatility on the supply side. This is because the conversion process entails very large investments, and there is no guarantee that all suppliers will be able to convert their mercury-based cellrooms by the relevant national deadlines. Indeed, the market investigation indicated that there is a certain degree of uncertainty, especially among customers, as to whether all capacity or only part of it will be converted.<sup>29</sup>

(63) These factors lead to significant instability between demand and supply in the future, and uncertainty as to the development of these variables, which would make it more difficult for existing suppliers to coordinate.

#### 4.2.3. *Upcoming entry and capacity expansion*

(64) The market investigation also indicated that the market for KOH is about to experience substantial new entry or capacity expansion.

(65) In particular, the Commission notes that Tessenderlo Chemie has announced that it will re-enter the market for liquid KOH through its subsidiary PC Loos.<sup>30</sup> Moreover, KOH producer Altair, which is already active in NWE through imports from Italy, plans to expand its capacity significantly.<sup>31</sup>

---

<sup>28</sup> See also Case M.6905 – *INEOS / Solvay / JV*, footnote 58 and paragraph 460.

<sup>29</sup> Questionnaire Q1 (customers), question 29.

<sup>30</sup> See [http://www.tessenderlo.com/binaries/Press%20Release%20PC%20Loos%20ENG\\_tcm9-29550.pdf](http://www.tessenderlo.com/binaries/Press%20Release%20PC%20Loos%20ENG_tcm9-29550.pdf)

<sup>31</sup> Questionnaire Q2 (competitors), question 40. See also minutes of conference call with Altair.

(66) The Commission considers that this entry and expansion would make potential coordination more unstable and therefore less likely to be maintained.

#### 4.2.4. *Competitors have different cost structures and incentives to compete*

(67) Cost structures in the KOH industry are not sufficiently symmetrical to make coordination likely. In particular, suppliers in the liquid KOH market tend to have different downstream product chains for the chlorine that is co-produced with KOH.

(68) Chlorine can be used in a variety of different markets, depending on factors including each supplier's production facilities, location, capabilities, market position and customer relationships. In this regard, KOH suppliers appear to have different downstream uses of chlorine, and therefore different opportunity costs of producing (or withholding) KOH. These complex cost differences make it very difficult for one supplier to understand the marginal incentive of another. In other words, producing one less tonne of KOH will have direct implications for each supplier depending on the use made by each supplier of chlorine.

(69) The costs of producing KOH can also vary depending on capacity utilisation; the ability of the plant to purify different types of KCl salt (and therefore purchase cheaper, impure KCl); and the scale of the plant. KOH suppliers will also incur different transport and logistics costs, which will be depend on their ability to store KOH, their ability to load different modes of transport, and their location.

#### 4.2.5. *Absence of concerns regarding coordination amongst customers*

(70) None of the customers that responded to the Commission's requests for information or were interviewed during the Commission's market investigation have expressed fears that the Transaction would result in or reinforce coordination in the liquid KOH market. Indeed, many customers have welcomed the transaction insofar as it creates opportunities for ICIG to expand its geographic reach in new and act as a greater competitive force on the liquid KOH market.

#### 4.2.6. *KOH Toll Agreement and customer split*

(71) The Commission considers that the KOH Toll Agreement and customer split agreed between ICIG and INEOS constitute factual elements that the Commission must take into account in this case - along with all the other elements in its file - in its assessment of the impact of the Transaction on the market for liquid KOH.<sup>32</sup>

(72) In this regard, the Commission notes that the KOH Toll Agreement will create links between the Parties. However, such links are of a short-term, transitional nature, and are destined to expire [...]. Furthermore, ICIG and INEOS have agreed to comply with the following measures for the duration of the KOH Toll Agreement:

---

<sup>32</sup> In this respect, it should be pointed out that, as is the case for any information which is material to the Commission's declaration of compatibility of a concentration, the Commission may be entitled to revoke the present decision pursuant to Article 6(3)(a) of the Merger Regulation, should ICIG fail to respect the measures set out in the KOH Toll Agreement.



- a. INOVYN will be entitled to request that ICIG toll manufactures a specified quantity of KOH on its behalf [...] of KOH, rather than any ratio or amount linked to plant output.
- b. ICIG will sell to INOVYN a fixed amount of [...] of chlorine per annum for a price of EUR [...] per tonne (irrespective of the amount of KOH produced by ICIG[...]). It is intended that INOVYN will on-supply the [...] of chlorine purchased from ICIG to INEOS' retained chlorotoluenes business at Tessengerlo.
- c. Each of INOVYN and ICIG will purchase independently their own KCl, which accounts for [...] % of the variable costs of KOH production.<sup>33</sup>
- d. The tolling fee to be paid by INOVYN to ICIG will be composed of a fixed tolling fee and a variable component to account for energy (and other variable) costs.
- e. The Target will split between KOH production and all KOH commercial/sales functions. The production and commercial/sales functions will be housed in separate legal entities, each of which will be 100% owned by the Target holding company. The Target production subsidiary will receive orders from both ICIG and INOVYN. It will also be responsible for the operation and take-off of KOH from the storage facilities. The management of the production and commercial/sales subsidiaries will be entirely separate.<sup>34</sup>
- f. The KOH stock tanks at [...] will be shared by INOVYN and ICIG in terms of volumes and costs, each party being entitled to a fixed amount of capacity of the stock tanks, regardless of each party's use.
- g. A compliance officer will be appointed by ICIG to ensure compliance with the confidentiality arrangements. The compliance officer will provide reports on a monthly basis to the Commission (or Monitoring Trustee appointed in Case M.6905 *INEOS / Solvay / JV*) on confidentiality-related issues (for example, breaches of the agreements, steps taken to train personnel, etc.).

---

<sup>33</sup> Since ICIG will also continue to produce KOH from its own facility at Thann, its variable costs at this plant will be unaffected by the Transaction. [Further detail concerning the business plan of ICIG].

<sup>34</sup> In addition, all employees of the production and commercial/sales subsidiaries will be subject to strict confidentiality agreements prohibiting them from sharing any commercially sensitive information between these subsidiaries. Physical separation measures (such as different offices etc.) will also be put into place as far as required and reasonably practicable. Accountants of the Chlorovinyls Business holding company responsible for the consolidation of the relevant figures for both the KOH production and commercial/sales subsidiaries will equally be subject to strict confidentiality agreements

(73) Finally, with respect to the customer split, the Notifying Parties implemented a procedure that minimises the possibility that INEOS KOH customers are allocated to ICIG based on strategic considerations conducive of coordination. More specifically, INEOS KOH customers were assigned to ICIG in a randomized manner subject to two constraints:

a. [...] and

b. maximising the total ICIG volume share post-transaction at [30-40]% in four regions: France, Germany, Germany/Austria, Norway, and France/Germany/Belgium/Netherlands.

(74) The randomised customer allocation was modified only marginally for the reasons of feasibility based on transparent rules that were discussed with the Commission.

(75) The Commission considers that the KOH Toll Agreement will only have a transitory impact on the structure of the market, as it is meant to expire [...]. The risk of collusive outcome stemming from this agreement, therefore, will be by nature limited to a transitory period.

(76) Lastly, the Commission considers that the measures taken by ICIG and INEOS are adequate, in this specific case, to eliminate the risk of coordination. These measures will ensure that the cost structure of each of ICIG and INEOS will remain different, and that no confidential information related to the KOH volumes produced at Tessenderlo by one party to the agreement would be shared with the other party. The Commission also considers that the customer allocation procedure followed by ICIG and INEOS has prevented the parties from influencing the outcome of such allocation in any strategic way. Therefore, such customer allocation does not increase the likelihood of coordinated effects as a result of the Transaction.

#### 4.2.7. *Conclusion on coordinated effects*

(77) In the light of the above, the Commission concludes that given the specificities of the Transaction at stake, coordinated effects are unlikely to arise in the market for liquid KOH under any plausible market definition.

## 5. **CONCLUSION**

(78) For the above reasons, the European Commission has decided not to oppose the notified operation and to declare it compatible with the internal market and with the EEA Agreement. This decision is adopted in application of Article 6(1)(b) of the Merger Regulation and Article 57 of the EEA Agreement.

*For the Commission*

*(signed)*  
*Margrethe VESTAGER*  
*Member of the Commission*