

## Seminar introductory speech

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### MR. CYRILLE SCHOTT

Prefect of the Basse Normandie Region, Prefect of the Calvados Département

Welcome everyone!

As Prefect of the Basse-Normandie Region and Prefect of the Calvados *Département*, it is with immense pleasure and interest that I welcome the 2005 international seminar on industrial accidentology and feedback to Caen, the "county seat" of the Basse-Normandie region and Calvados.

This event has been organised for the 6th time by IMPEL, "a national network for the application and respect of environmental law." This structure, established in 1992, is designed not only to encourage the exchange of information and the comparison of experiences but also to promote a consistent approach in terms of the implementation, application and monitoring of environmental law.

I would like to welcome all of the industrial installation inspectors from the various member states of the European Union united within this network. Twelve countries are represented this morning: Germany, Austria, Belgium, Italy, Spain, Portugal, Sweden, Lithuania, Czech Republic, Slovakia and the Netherlands. And of course the French inspectors in charge of the classified installations and labour inspectorates. This extensive international participation can only contribute to enriching our exchanges and debates.

As you know, our fellow citizens, French and European, have long been aware that major risks are no longer "inevitable". This is also true for natural hazards. Lack of foresight and awareness are highlighted at each new disaster. But we all know that "zero risk" cannot, unfortunately, be guaranteed. Proper control of technological risks is thus a primary requirement for both companies and public authorities. This implies a certain understanding, shared by all public and private players, of the conditions and actions required to reduce the probability of an incident and the potential effects.

In all countries of the OECD, the prevention of industrial hazards is based on the postulate that the company is the primary entity responsible for the operational safety of a hazardous installation. The public authorities are in charge of defining the conditions in which the company's activity can be authorised and in checking that the operator properly controls the risks and nuisances throughout the installation's service life. You perform this essential mission for society and I am convinced that you perform your duties with rigour, competence and commitment, as your presence here today demonstrates.

I would like to speak to you briefly about the tasks of the Prefect. As you know, the Prefect represents the government and ministries at the regional and county (*département*) level. He is thus in charge of implementing the government's policies in a wide variety of areas, including the one which concerns you in particular. This area is of primary importance for the Prefect and has become increasingly so over the last few years. For me, the "Direction Régionale de l'Industrie, de la Recherche et de l'Environnement" (DRIRE) is one of the key departments of territorial government.

Before becoming Prefect of the Caen region in late July 2004, I was previously posted in regions which had their fair share of sensitive industrial installations, including Pas de Calais, Seine & Marne and Alsace, with the well known Fessenheim nuclear power plant, and the chemical installations in southern Alsace near Basel. The DRIRE was obviously crucial for my activity in the field of risk prevention.

Although the Basse-Normandie region is not a major industrial region, it is nevertheless home to installations that are, though few in number, notable in terms of hazards. I am obviously referring to the nuclear installations, as well as the 14 SEVESO establishments: petroleum depots, chemical factories and explosives depots, which dot our territory.

Feedback from the AZF accident in Toulouse led the public authorities to reinforce existing regulations for these types of installations. The Act of July 30, 2003 pertaining to industrial risk, represents a new approach and major challenge, requiring greater involvement of society in risk management, notably with the implementation of CLICs ("Comités Locaux d'Information et de Concertation", Local Committees for Information and Consultation). The Basse-Normandie Region is significantly involved in the implementation of this act. One of the eight pilot sites for experimentation relative to the implementation of PRRT ("plans de prévention des risques technologiques", technological risk prevention plans) is located in the region, in Vire, and concerns a liquefied petroleum gas depot. Studies of the stakes and contingencies are being finalised.

In the near future, the DRIRE and DDE hope to present these stakes and contingencies and submit for approval new urbanisation rules for the identified vulnerable zones. The results of this work will form the technological risk prevention plan. For the region, there are eight PPRTs in all that will be developed from now until 2007. It is an arduous task because protection zones must be foreseen with urbanisation rules that sometimes interfere with community development or expansion projects. It must obviously be strict in these matters and ensure that sensitive installations do not pose new risks in their perimeter, due for example to the construction of new housing which would increase the number of people living near these industries. This important and difficult task obviously involves the DRIRE and often the Sub-Prefects, and even the Prefect, must intervene repeatedly in the debate.

If risk prevention is a fundamental point of the system, crisis management must not be neglected, despite the precautions taken, as accidents are still possible. The anticipation of crisis situations, with contingency plans and exercises, are required for better control, at the crucial moment.

We have programmed two special intervention plans for key installations in the Calvados area for this year and early 2006. This reminds me of the three-year exercise cycle (1995-96-97) that I had to manage with the DRIRE in relation to the Fessenheim nuclear installation when I was Prefect in Alsace. The first year, we tested the special intervention plan under the Prefect's authority concerning the plant, and we mobilised the entire civil population of the villages (500 people) around Fessenheim. The second year, we implemented the internal contingency plan at the nuclear power plant, with the measurements to be taken by the company's management, and the special intervention plan outside the plant. The third year, we organised a bilateral Franco-German exercise, and mobilised our German colleagues. When I was organising my crisis centre at Colmar as the Prefect of the Haut-Rhin, the "Regierungspräsident" had formed a crisis centre at Fribourg. The exercise took place on both banks of the Rhine. The context was not easy, as this power plant was the subject of debates and ecological movements began to flourish in France and Germany. In the end, these exercises were seen as a major success. They required extensive mobilisation of the DRIRE, of course, but also all the other departments concerned: firemen, police, gendarmerie, infrastructure, and the Prefecture. They also required extensive mobilisation of the Prefect himself and his sub-prefects, owing to the special media attention brought on by these exercises.

I think that one shouldn't hesitate in conducting such exercises on sensitive installations. Their preparation must be very careful and demands extensive joint action, particularly with elected officials, representatives of local populations, so that the exercise is correctly understood and that everyone grasps the meaning and ensures that it is successful. You know, during these exercises, the prefectorial authority is at the core of the program in terms of cooperation with the operators, municipalities, elected officials, governmental departments and the press, which relay information. The round-table discussion here on this theme is an excellent idea. It will be presided by Alain Schmitt of DRIRE Basse-Normandie and Alain Gueydan, the Director of my office at the Prefecture. I believe that it will be instructive and useful.

I was telling you earlier that after the preparation, after the exercises, a crisis could still occur. The crisis that I faced in the "Noroxo affair" in the Pas-de-Calais had very dire consequences: 86 people were afflicted by Legionella and 18 died. Management of the crisis over time required an extremely close link between the Prefect, the DRIRE and other agencies such as the DDASS, the CIRE ("cellule inter régionale d'épidémiologie", inter-regional epidemiological unit), the national bureaus such as the DPPR ("Direction de la Prévention des Pollutions et des Risques", risk and pollution prevention department), the health department, as well as the Legionella national treatment centre located in Lyon. The Prefect's office played a central role in the crisis management. It all began when the DDASS became aware of two sick people who were living just 300 m from one another, near the Noroxo plant in the city of Harnes. I received a telephone call from the sub-prefect on duty on a Saturday afternoon, to tell me that two people had been contaminated, one of whom had died, and his suspicion about Noroxo and the DRIRE's draft proposal to shut down the installations to clean them. I immediately implemented this proposal. An epidemic was predicted and the companies located nearby were suspected. I immediately set up a crisis centre with my office, the civil protection department, the DRIRE and the DDASS. The plant cleaned up its installation and we are searching for other potential sources of contamination in the communities around Harnes. The crisis progressively spread. It should be mentioned that nearly 1,500 analyses were conducted in other installations over a 2-month period. Around mid-December, we were able to confirm that the bacterial strain found among the contaminated individuals was the same as that taken at Noroxo.

We found the answer and the crisis should therefore have ended, but that wasn't the case. After the first wave of contaminations, a second wave followed. It was at this time that the crisis extended to the national level. Despite contacts already established between all the experts at the county, regional and national level, I requested an additional expert assessment. The government then set up a task force of specialists from both the public and private sectors. We became aware that the people contaminated during the second wave had the same strain of *Legionella* as that found at Noroxo. For the second time, it was decided to shut down the plant and we requested higher-level cleanup operations. Meanwhile, the specialists discovered that during the cleanup phase, which had been conducted normally, contaminated aerosol emissions could still occur. It took a long time to develop the protocol for the plant's second cleanup operations and required a very thorough assessment. During the second wave of contamination, in the month of January, the same strain as that found at Noroxo was discovered, in concentrations below the regulatory threshold, in another local plant that employs several hundred people. So what was to be done? Shut down the plant and put several hundred people on partial unemployment? Or not shut it down, as it would be difficult to relaunch the activity?

The professor managing the specialised Legionella unit in Lyon raised three points during our meetings. The Legionella concentration is one element, of course, but it's not the only one. The virulence of the bacterial strain must be taken into account; it was highly virulent since we already had fifteen or so deaths. The sensitivity of the population in this former mining town must also be taken into account; it was fragile for various reasons and the number of deaths has shown this. In light of these elements, a decision had to be made and I requested that the plant be shut

down, working in close cooperation with the director of the DRIRE, in a context where the population still had questions and the elected officials had a hard time keeping up. Difficult decisions had to be made, like explaining the plant's second shutdown under extreme media pressure. At the height of the crisis, I met regularly with the mayors and issued a press release every day. Those are some of the key points I wanted to raise about crisis management. During a crisis of this type, it was obvious that the Prefect had to play a leading role and work closely with the DRIRE, your colleague Pierre-Franck Chevet, and his entire team, as well as the Director of the DPPR, Mr. Trouvé, and the Health Commissioner.

But the topic here is to specifically discuss the activity of the DRIRE and the DPPR.

I hope that you have understood that the Prefect is responsive to the needs of your field, because in the event of a crisis that threatens lives, makes people sick, and causes great concern, we must all be mobilised.

I hope that the presentations and discussions today are genuinely productive, that the discussions produce some solutions for the accomplishment of your daily tasks. I again welcome you to our region and sincerely hope that you will enjoy your stay in Caen. The organisers have done everything possible with this goal in mind.

In conclusion, I would particularly like to extend my heartfelt thanks to Mr. Alain Schmitt, Director of the DRIRE Basse-Normandie, for his personal involvement and that of his entire team in organising these two days. Thank you for your attention.

## MRS. MARIE-CLAUDE DUPUIS

Head of the Industrial Environment Department

Goodmorning,

It is always an immense pleasure for me to open this seminar on industrial accidentology and feedback, organised under the aegis of the IMPEL network.

Firstly, I would like to extend my most sincere thanks to our hosts for having welcomed us in such wonderful conditions. I would particularly like to thank Mr. Cyrille Schott, Prefect of the Basse Normandie Region, who, despite his numerous commitments, expressed his desire to welcome us personally this morning. I would also like to thank Alain Louis Schmitt, Regional Director for Industry, Research and the Environment, and his entire team for their involvement in organising this seminar in close cooperation with the BARPI.

I'm also thinking of the numerous contributions - no less than 18 this year! - the European inspectors (13 French inspectors and 5 from other European countries) who prepared the presentations, assisted by the labour inspectorate in many cases.

Changes continue to be made since the previous sessions following the Toulouse catastrophe.

Firstly, in the texts: in order to facilitate the application of the Act of July 30, 2003, 3 decrees, 2 orders and a memorandum state the principle of proportionality and the consideration of safety hazard analysis. This concerns the steps taken by the operator to control risk at the source (how far should the operator go to reduce the risk?) as well as the assessment of this approach by the Inspectorate and the Prefect, either when authorisation is given or when the danger study is revised, or to define the measures proportional to the residual risks within the scope of plans for the prevention of technological risks:

- 3 decrees, including: the decree of February 1<sup>st</sup>, 2005 deals with the organisation of CLICs ("Comités Locaux d'Information et de Concertation", local information and joint action committees) / the second, relative to PPRTs ("Plans de Prévention des Risques Technologiques", plans for the prevention of technological risks), was validated last May 7th by the State Council / the third decree concerns the modification in progress of Decree of September 21st. In particular, it stipulates the content of the danger studies, and introduces the notion of risk control by the operator at a level that is "as low as possible along technical and economic lines, considering the state of the art on the one hand and the vulnerability of the installation's environment on the other".
- 2 orders: one determines the technical criteria and the Probability, Severity, and Kinematics evaluation thresholds of accidents, the second modifies and adds consistency to the "SEVESO" order of May 10, 2000, in terms of risk control,
- 1 memorandum deals with the Prefect's assessment of the steps taken by the operator to control risks.

In close cooperation with the French Equipment Ministry, we will be finalising the PPRT development guide. Another memorandum will set the criteria used to determine risk zones, as well as the urbanisation rules to be observed according to the risks. Experimental steps aimed at developing PPRTs on 8 test-sites, such as that of the VIRE, mentioned by the Prefect of the Basse Normandie Region, will allow us to fine tune the method.

The objective of sector-based working groups, in which the Inspectorate actively participates, is to support these methodological changes at the technical level. Controlled by the DRIRE and mandated by the DPPR, they include operators, labour unions, experts, and inspectors of classified installations and the SEI (Service de l'environnement industriel, industrial environment department), to concretely define the new evaluation and risk control methods, sector by sector.

Accidentology feedback, often taken from the ARIA database, is often used within these groups as they need to base their positions on real-life events. The analysis of past accidents remains a pragmatic and relatively reliable means to provide points for discussion or answers to questions.

This arrangement, at the core of risk prevention, requires enhanced openness and transparency of all players so that everyone can benefit from the lessons to be learned. Since the Dijon seminar in November 2003, the small circle of contributing labour unions has widened; protocols have thus been passed with the UIC ("Union des Industries Chimiques", the French Union of Chemical Industries), which recently submitted 60 incident analysis reports. Since late 2004, the CFBP ("Comité Français du Butane Propane", the French Butane Propane Committee) has taken part in BARPI's consultations, thus joining the program initiated in late 2001 by the GESIP ("Groupement d'Etudes et de Sécurité de l'Industrie Pétrolière"). The AFF ("Association Française du Froid", French Cooling Association) and the CNF ("Conseil National du froid", the National Cooling Council) have also

recently joined. This type of initiative should be developed more widely as the organisation of feedback sharing is still too rare...

More than ever, risk poles and centres actively request feedback in order to analyse accidents and files. The Inspectorate's share in the requests submitted to BARPI has thus increased from 10% to nearly 30% from 2003 to 2005; this is a step in the right direction and should be encouraged. In compliance with the request of the DPPR in November 2003 in Dijon, nearly 30,000 accident or incident summaries are

now available on the web site [www.aria.ecologie.gouv.fr](http://www.aria.ecologie.gouv.fr). Our foreign colleagues will certainly appreciate that the main sections of this site have been translated into English. In return, the system relies on the fact that everyone submit their data in real time: reports, notes, diagrams, and photos, etc. to BARPI.

This requires that you collect the information from the operators regarding the circumstances of the accident, the intervention measures and the positive feedback. Positive feedback refers to the corrective actions implemented from both the technical and organisational standpoint. In this respect, I would also like to remind you that an electronic accident report was created through the joint efforts of inspectors and SEI representatives. This format can be used to draft reports to the Prefect or the Public Prosecutor. The form can be downloaded from the BARPI web site. Currently one inspection report out of two submitted to the BARPI respects this format. It is highly desirable that the Inspectorate make a special effort to use the format systematically.

During the previous IMPEL seminar in Dijon, the DPPR had insisted on the assimilation of the European scale for industrial accidents by the Inspectorate and the operators. The characterization of various cases, according to this scale, are provided in your file. In order to facilitate this assimilation, the BARPI now systematically includes this 4-icon representation on its site and in its various publications. This representation helps the reader understand the effects and consequences of the accidents by placing all elements in perspective. It is in the Inspectorate's best interest to continue using this tool in its exchanges with both operators and experts. The stakes are clear: place the events into better perspective through impartial analysis.

In case of an incident or crisis, the public also needs a reference framework. In this spirit, guidelines and index for urgent communication were designed in 2004 to meet the request of the Higher Council for Registered Installations and the DPPR. Experiments were also launched in 8 French regions in 2005. I repeat that, despite the difficulties and the natural unwillingness of the "technicians" to communicate, the objective of this approach is get the operators to provide press releases after an incident or accident. Special effort deserves to be made in this field. The dangerous materials index, consistent with the European scale, is designed to give easy-to-use and easily understandable points on the source term of the event. A report detailing this experiment will be issued at the end of the year. The objective is to help the public understand the realities and difficulties of risk prevention.

Beyond the obligation to declare incidents and accidents in real time in application of article 38 of the order of 1977, you have also noted that the act of July 30, 2003 introduced the obligation of periodic dialogue within the scope of the CLIC, in article L125-2 of the Environmental Code, on the theme of incidents and the actions taken.

Openness vis-à-vis the general public is a very important issue. This will require many years of work on our part.

Today, we are aware that our profession must integrate this component by aiming to increase society's involvement in managing these risks. It is also a means for reducing the severity of crises and making them more manageable. This question will undoubtedly be brought up during the crisis management round table that we integrated in the case study program cycle. Alain-Louis Schmitt, who presided over the DRIRE working group on this theme in 2004, will present it later this afternoon.

In conclusion, I'd like to mention that the seminar kit includes, notably:

- the Dijon seminar technical sheets (in French or in English)
- a brochure on the technological accidents from 1992 to 2004 in France.
- A CD-ROM presenting feedback on the accidentology of installations in which chlorine was involved. This document, the presentation of which has just been completed by the INERIS, results from a joint effort with the MEDD and the Inspectorate represented within the chlorine working group involving experts and the "Syndicat des Halogènes et Dérivés" (SHD).
- an accompanying document summarising accidents taken from the ARIA database and presenting analogies with the cases dealt with. They can be used as a reference during the various presentations.

I propose the following schedule for presentations:

- this morning, the problem of operations and maintenance
- this afternoon, prior to the round-table discussion, technical themes related to the crisis
- tomorrow, technical and organisational failures in the operational phase
- then, more varied themes having severe consequences in common
- and lastly, events involving natural elements.

Our seminar is organised on a half-hour cycle with presentations lasting a maximum of 15 to 20 minutes, each followed by a 10 to 15-minute discussion period with the audience.

Thank you for your attention and I hope that your exchanges are enlightening...