

**CHEMICAL WEAPONS PROLIFERATION
MECHANISMS BEHIND
THE IMHAUSEN/RABTA AFFAIR**

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Preface.

On 16 March 1990, the *Vrije Universiteit Brussel* (VUB) and the *Groupe de Recherche et d'Information sur la Paix* (GRIP) organize the 2nd Annual Conference on Chemical Warfare on the theme: "Chemical Weapons Proliferation: Policy Issues Pending an International Treaty". The crisis over the chemical production plant at Rabta in Libya (1989) has pointed to the alarming extent of the problem of chemical weapons proliferation. To curb the transfer of production facilities and raw materials for chemical weapons, export controls are needed on international and national levels. The accent of the Brussels conference is placed on problems involving the implementation of such control mechanisms.

The present issue of "Vredesonderzoek" contains a contribution by Jean Pascal Zanders to this conference. Jean Pascal Zanders is a research fellow at the Centre for Polemology of the Free University of Brussels, who has been working on the question of chemical warfare for some years. Here, he provides insight into the mechanisms behind the Imhausen/Rabta affair, one of the recent significant cases of chemical weapons proliferation.

Bruno Coppieters

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Introduction.

Between 7 and 11 January 1989, virtually all countries met in Paris to reaffirm their commitment to the 1925 Geneva Protocol and to a future global ban on chemical weapons. 1988 had been a particularly horrendous year. Iraq had employed chemical agents against Iranian troops at an unprecedented scale. Baghdad also openly admitted to using them, defying international condemnation. Halabja symbolized the Kurdish plight. Their situation was only to worsen after the cease-fire. Repeated massive chemical attacks forced tens of thousands Kurdish civilians to flee to neighbouring Turkey and Iran, two countries where they are also persecuted. In September, both President Reagan and President Mitterand expressed the necessity to hold an international conference before the United Nations.

During the days immediately preceding the conference, the United States brought their dispute with the Federal Republic over German participation in the construction of a chemical weapons plant at Rabta in Libya to a head. Frustrated with German non-action, Washington left the back corridors of diplomacy and brought the issue into the open. The Rabta affair is therefore probably the best documented case of chemical weapons proliferation. It also had ramifications in other countries, such as Belgium, thus allowing insight into the kind of trade constructions set up to provide a country with technology, expertise and chemical compounds for its domestic production of chemical weapons. Moreover, both countries conducted inquiries into their involvement, and both governments are currently working on draft legislation to curb further exports related to the manufacture of chemical weapons. However, the most recent information indicates that in West Germany and in Belgium institutional resistance to the new regulations may be growing. In the Federal Republic the christian-democrat coalition parties are accused of consciously delaying the legislative process. Renewed American concern over Germany's attitude may explain why the Rabta issue suddenly resurfaced in March 1990. Apparently, the European Commission too has prepared new regulatory proposals, but meets with resistance from some member states.

This publication serves as a background note to the *2nd Annual Conference on Chemical Warfare: Policy Issues Pending an International Treaty*, which takes place at the Free University of Brussels on 16 March 1990. At the present stage, the information mass on the Rabta affair has rendered it virtually impossible to offer a comprehensive analysis of the mechanisms involved. This paper's main purpose is to summarize the main principles and contributing factors behind the

spread of chemical weapons, as well as trying to identify the most relevant points in the particular case of Rabta. As we were finalizing this publication, the United States released new information on the Libyan chemical plant. We included a summary of the available data in the chapter on Libya's alleged involvement in CW-programmes. The cut-off date is 10 March 1990.

We wish to thank Joachim Badelt (Berghof Stiftung, Berlin), Mrs Nelly Maes MP, Prof. Julian P. Perry Robinson (University of Sussex), Hugo Van Dienderen MP and the staff of the GRIP for providing us with essential documents. Additional funds for the publication were granted by the *Nationaal Fonds voor Wetenschappelijk Onderzoek* and the Ministry for Economic Affairs.

The present paper will be elaborated further and published as part of the proceedings of the conference in the fall of 1990.

Jean Pascal Zanders
Brussels, 12 March 1990

Mechanisms behind chemical weapons proliferation.

The issue of chemical weapons proliferation is complex. It involves technology transfers and the trade in industrial equipment and chemicals which often have legitimate non-military applications. Many developing countries are establishing a broad chemical industrial base. In the absence of an international treaty banning chemical warfare with a stringent verification regime on the production of toxic chemicals, the potential for manufacturing crude chemical weapons is widespread. It is generally believed that no market exists for ready-to-use chemical munitions, although - in an apparently isolated case - a London based arms dealer was arrested for trying to buy 500 sarin bombs for Iran in January 1989¹. However, it is extremely difficult to predict whether such incidents will not become part of a broader pattern. Chemical weapons proliferation, as it is presently being discussed, constitutes a flow of precursor chemicals, high technology and expertise from North to South, from industrial to industrialising countries. Third World countries are commonly viewed as recipients, potentially interested in domestic production of chemical warfare agents. Seldom, they are considered as a proliferation source of ready made chemical munitions in their own right. This is in part reflected by the fact that common export control measures have been agreed upon amongst industrialised nations, and that - as far as we were able to establish - few, if any, efforts have been undertaken to encourage Third World countries to take similar steps. Nevertheless, underlying many of the allegations and accusations against Libya is the fear that one day it may become an independent supplier of agent and munition end products.

Adding to the complexity of the proliferation problem is the sheer impossibility of states or independent investigators to establish beyond any doubt whether a country is engaging in a chemical armaments programme or pursuing legitimate commercial goals. The West German Federal Intelligence Service, for example, believed for more than five years that Libya possessed a chemical weapons production plant near Abu Kammash (Bu Kemmesh), for which German firms had provided the equipment. On 13 October 1988, it officially retracted its assessment after a prolonged period of doubts². The case illustrates the dilemma's facing a government confronted with the alleged complicity of nationals in overseas chemical armament programmes. One can only speculate on the extent

¹ P. Murtagh & M. Tran, 14 January 1989.

² *Unterrichtung durch die Bundesregierung*, 15 February 1989, pp. 4-5. The report mentions other similar cases.

to which the Federal government hesitated to act on the Rabta allegations as a result of the Abu Kammash affair. Nevertheless, the example raises questions concerning the nature and the amount of evidence required before a government can or will take legal action against a firm violating export regulations.

Similar uncertainties pertain to the moment when the government must intervene. Brad Roberts, for instance, discerned two steps in the proliferation process³. In a first phase, a spread of the will and the means to obtain a chemical capability takes place. The next stage involves actual production and possible use. For many countries, the growth of the political will for a chemical armament programme is virtually impossible to track. If the US binary production plan is anything to go by, a prolonged process of incremental decision-making inside politico-military bodies determines the course of policy. Binary weapons were first conceived in the 1950s. Pressure to augment research funds and start production increased after the 1973 Yom Kippur war, when it was discovered that Soviet-made tanks were capable of operating in an NBC-environment. In December 1987 production of the first binary artillery shells started. After a series of setbacks, forces in favour of the programme had gained sufficient momentum to overcome resistance on Capitol Hill and to survive bitter acrimony inside NATO.

Iraq too must have pursued a chemical capability for almost two decades. Baghdad's interest in chemical warfare was reported as early as spring 1965⁴. Ten years later, it was trying to buy a complete pesticides plant in the United States and Europe. However, the world's attention was drawn to the development only after the United Nations had confirmed the use of chemical weapons in March 1984. Many of the firms that later became known to have been involved in Iraq's chemical warfare programme insisted they had had no reasons to assume that Baghdad was engaging in illegal activities. At that time, failing to detect the first stage of Iraq's intentions may have been a valid excuse for both the governments and the companies involved.

For example, on 28 February 1986, it was uncovered that the Belgian subsidiary of Phillips Petroleum Co. had delivered 500 tons of thiodiglycol - a key compound for manufacturing mustard gas - to

³ Joint Hearing before the Committee on Foreign Relations and the Subcommittee on Energy, Nuclear Proliferation and Government Processes, 28 June 1984, p. 50.

⁴ Allegations of the use of gas were made by the Kurdish Democratic Party in May 1965. In September 1964 Iraq was rumoured to be purchasing large quantities of gas masks and by March 1965 there was widespread surmise these might be connected with an imminent offensive against the Kurds. Both Switzerland and Germany were claimed to be the suppliers of the weapons and the masks were said to be obtained through Egypt from Switzerland. (The Times, 26 March 1965 and 21 May 1965, as reported in J.P. Perry Robinson, 1971, p.162.)

Iraq in 1983 and an additional 5 tons to Spain two years later⁵. In 1983, the plant was licensed to produce and commercialize petro-sulphur compounds, such as mercaptans and thiodiglycol. Representatives of the company were shown documents by the Dutch firm indicating Baghdad as the final destination. The firm nevertheless thought it was unfairly accused of wilful intent⁶, especially as chemical attacks had not yet been reported at the time of the transaction. Belgium had no export controls on chemical compounds, and thiodiglycol was not listed as particularly dangerous by either Belgium or the European Community⁷. Therefore, Iraq's stated agro-chemical purposes appeared entirely legitimate⁸. The view has not been disputed by the Parliamentary investigative committee on arms sales⁹. Phillips Petroleum Co. halted all further deliveries in 1984 as soon as it knew Iraq was employing mustard gas, even though no export controls were yet in force¹⁰. In 1987, the production license for thiodiglycol was withdrawn. Besides, in 1986, the Belgian government too was ill prepared to enforce its regulations. For instance, the production license was issued to Phillips Petroleum on the basis of compliance with environmental standards. Therefore, the first oral parliamentary question on the issue on 28 February 1986 was answered by the State Secretary for the Environment, who had to admit that coordination problems existed regarding export rules¹¹. Indeed, production licenses fall under the authority of the Flemish regional authorities, whereas chemical exports are overseen by national ministries. However, not all can be reduced to the process of reforming the Belgian state. Shortly after the disclosures, then European MP Willy Kuijpers inquired after the Belgian export controls on precursors. Mark Eyskens, at that time Minister for Economic Affairs (and currently

⁵ R. Collier & F. De Smet, 28 February 1986.

⁶ P. Van Mossevelde, 1 March 1986.

⁷ Statement to the Belgian Parliament by M. Smet, State Secretary for the Environment, 28 February 1986. She did not refer to the export restrictions on thiodiglycol the Belgian government had imposed one and a half years earlier.

However, the equivocity surrounding the compound is also illustrated by an advertisement the Chicago based chemical division of Morton Thiokol Inc. ran in the March 2, 1987 issue *Chemical Marketing Reporter* lauding the versatility of thiodiglycol. This occurred almost three years after the Australian Group had adopted its warning list.

⁸ Mr Verding, Vice-President of Phillips Petroleum, declared to the Parliamentary Committee investigating Belgium's role in arms sales to Iran and Iraq, that orders for between 500 and 3000 tons of sulphur-compounds are not uncommon in the agro-chemical sector (Parlementair onderzoek [...], 28 February 1989, p.366). Other chemists, for instance Stanford Fertig, head of the pesticide research at the US Department of Agriculture's research centre, doubted that thiodiglycol is at all used in agriculture and that sales for other purposes involve no more than a few tens of tons at a time (J.J. Fialka, 16 September 1988).

⁹ Parlementair onderzoek [...], 28 February 1989, pp. 365-367; 559.

¹⁰ After the first denials, *De Morgen*, which made the original disclosure on 28 February, nevertheless stood by its original claim that the company had shipped an additional 5 tons to Spain in 1985, which it believed to have also been diverted to Iraq. The required export license was only regularized six months after the shipment (R. Collier & F. De Smet, 1 March 1986). To the Parliamentary Committee, Mr Verding declared that the second shipment was ordered by the Spanish firm Cades which used the compound for dyes. He insisted that the Belgian customs had been informed of the nature of the chemical at the time of the shipment and that as soon as the company had learnt that in the meantime an export license was required, it had taken steps to have the transaction regularized (Parlementair onderzoek [...], 28 February 1989, p. 336). Both Phillips Petroleum and Cades claimed that the shipment was destroyed, because the compound did not match the Spanish firm's specifications.

¹¹ M. Smet, 28 February 1986.

Foreign Affairs) replied in a letter we were shown last year, that T.D.G. was an abbreviation for *tertiary diglycol*. He added that since that compound did not figure on the export control warning list, no export license was required.

Today, one might expect that the greater awareness of both the chemical industry and governments ought to enable them to detect indications of a nation pursuing a chemical capability at a much earlier stage. Yet, many countries, and the smaller ones in particular, have to rely on intelligence gathering of larger allies for much of their information. As allegations and assertions often serve propaganda purposes, they may display a large degree of scepticism as to the validity of the information received, and thus fail to take the necessary measures at the appropriate time.

The Reagan Administration, for example, accused some twenty to thirty countries of being possessor states as it was intensifying its campaign to rally support for the binary weapons production programme. Early last year, the CIA repeated its estimate that "as many as 20 countries"¹² *may* be developing these weapons. In fact, there exists little certainty about the number of possessor states or their identity. Sources are often "leaked" US intelligence documents and all but a few provide irrefutable evidence. A critical note or nuance frequently disappears when quoted in the press, thus adding to the general sense of insecurity. One may wonder to what extent this serves the interests of the rapidly expanding branch of the chemical defence industry¹³. Similar comments can be made regarding US assertions of Soviet non-compliance with existing arms control treaties. More than once, the evidence put forward proved to be less than conclusive. With particular reference to the Rabta case, the US bombing of Tripoli in 1986 and the clash between fighters over the Gulf of Sidra a couple of days before the opening of the Paris Conference must have increased German scepticism regarding the scale of the affair. Washington, for its part, is very concerned about this credibility gap¹⁴:

"[...], there are countries in the world who believe that any accusation we make against the Soviet Union is simply part of cold war rhetoric, and they demand a higher degree of proof that what we are doing is not simply bashing the Soviets, [...]."

Such frustration made Washington decide to go public on the Rabta issue.

¹² R.L. Koenig, 2 February 1989.

¹³ S.J. Lundin, J.P. Perry Robinson & R. Trapp, 1988, p.102. From 1982 onwards, the chapters on chemical and biological warfare in the SIPRI Yearbooks provide a detailed account of allegations.

Only the USA and the USSR have formally declared possessing military relevant chemical stocks. Iraq has admitted to using chemical weapons. North Korea and Syria are invariably being named. At the 1989 Paris Conference on chemical disarmament, Israel hinted it possessed a chemical capability. France, on the other hand, was generally believed to have stockpiled chemical munitions, but in 1988 President Mitterand declared before the UN to have no such weapons.

The problem also poses itself the other way round. At the Geneva Disarmament Conference, few countries have declared their non-possession of chemical weapons, in spite of the fact this will be one of the basic provisions of the future treaty.

¹⁴ Testimony by US Ambassador C. Flowerree, Joint Hearing, 28 June 1984, p.78.

The proliferation problem is compounded further by a disarmament controversy emerging between industrial and industrializing countries. The failure of the nuclear powers to comply with the disarmament provision laid down in Article 6 of the Treaty on the Non-Proliferation of Nuclear Weapons has aroused suspicions about the security implications of a chemical warfare convention amongst many Third World nations. Especially in the Middle East, there seems to be a growing linkage between chemical and nuclear deterrents¹⁵. Moreover, the Gulf War, from which Iraq dubiously appeared as victor, gave many countries in the East-West periphery the impression that chemicals are once again a very effective - and permitted - weapon. Moreover, it is far from established that the moral and emotional revulsion born in the trenches during the First World War, is shared by those nations. Therefore, failure to conclude a global ban could well lift the taboo from chemical weapons, thus opening the way for conventionalization. Even so, the very technical approach and the difficulties to reach the smallest of accords at the current chemical weapons talks must convince many governments of the effectiveness of these weapons, in the same way it motivated Japan's leaders not to ratify the Geneva Protocol in the late 1920s. To many Third World countries, progress at the Geneva Conference is too slow. A chemical deterrent offers more security in the short term. Such beliefs are at the heart of the proliferation issue. There thus exists a very close relationship between the spread of these weapons and the protracted disarmament talks. Only the successful conclusion of a global treaty with an intrusive inspection regime for the chemical industry can solve the problem.

According to a Congressional report investigating the potential proliferation consequences of the US binary production programme, many of the necessary preconditions for the spread of chemical weapons exist under all circumstances¹⁶:

- the international legal regime for the control of chemical weapons is neither comprehensive, universal, nor adequately verifiable;
- the few laws of war that exist today derive their strength largely from the threat of reprisal in kind, thus justifying weapons stockpiles for deterrence purposes, though these tend to perpetuate the threat they are intended to deter, and to stimulate newcomers to adopt the same approach;
- there may be a growing perception that changes in CBW technology increased the military utility of such weapons for certain defence needs of Third World nations.

J.P. Perry Robinson distinguishes between four main promoters of chemical weapons proliferation: the pressure of armament or vertical proliferation on the one hand and three forms of horizontal

¹⁵ (-), 7 January 1989; J.P. Collette, 10 January 1989; C. Tréan, 10 January 1989; C. Lorieux, 11 January 1989 and 13 January 1989; E. Cody, 13 January 1989.

The issue had already been raised by Arab representatives fearing Israel's putative nuclear capability during the mid-seventies (J.P. Perry Robinson, 1982, p. 336).

¹⁶ Report prepared for the Subcommittee on International Security and Scientific Affairs, 24 April 1984, pp. 16-17.

proliferation on the other, namely force integration, the poor man's deterrent apprehension and the adversary's lack of a chemical defence or deterrent¹⁷.

(i) The *pressure of armament* or vertical proliferation is best illustrated by the US binary production programme. Key to defining this promoter is the theory stating that "*the level of armament of a state at a particular moment, whether in quantitative or qualitative terms, is set by subsidiary processes of supply and demand*"¹⁸. On the one hand, there is the military demand as specified in national security requirements. These stimulate programmes for acquiring, maintaining and deploying weapons. On the other, there is the industrial and scientific capacity to supply a nation with weapons. Theoretically, there should exist an equilibrium between pull and push forces. However, numerous other factors, such as political and institutional considerations, play an equally important role, so that often countries are armed at much higher levels than security needs warrant. As a result, demand may be as much a reflection of supply as vice versa. Additionally, the degree of *assimilation* of a particular arms category into mainstream military theory also determines the nature of the armament process. The process of assimilation may be defined as "*the process whereby, for a novel technology, supply and demand become reconciled with one another*"¹⁹. Chemical weapons, for example, are little or not at all assimilated in most countries. Their use being outlawed, public opinion's strong display of abhorrence, technical constraints, etc. relegate them to the periphery of military doctrine. As such, maintaining or building up chemical stockpiles are a typical example of supply-led armament. Removing technical constraints may be very influential for incorporating a specific type of armament within the prevailing military doctrine and organisation. So, if supply institutions can somehow inflate the perceived need for that specific type of armament, while at the same time reducing the opportunity costs for its incorporation - i.e. the costs for the military institutions and doctrine to adapt themselves to the new weapon and to discard the ones it will replace - the pull of demand may very rapidly accelerate its assimilation²⁰. In the course of the US binary production programme, these intermediate steps were clearly discernable. The US Chemical Corps, which survived legislative attempts to have it dissolved, is the institutional pillar behind the supply of chemical weapons. The presentation of novel technology (binary systems instead of unitary, which are safer to handle and to store) was followed by a new perceived military usefulness (the possibility of implementing new tactics) and vulnerability of own forces (a "rediscovered" Soviet and terrorist threat, resulting in a need for a credible deterrent). An increasing number of allegations and

¹⁷ J.P. Perry Robinson, 1982, pp. 322-339.

¹⁸ J.P. Perry Robinson, 1982, p. 322. The theory is further elaborated in J.P. Perry Robinson, 1989.

¹⁹ J.P. Perry Robinson, 1989, p. 120.

²⁰ J.P. Perry Robinson, 1989, p. 117.

the confirmed employment of chemical warfare agents in the Gulf further contributed to the right kind of atmosphere for launching a rearmament programme. Although this assimilation process still is in its initial stages, the longer it takes to conclude a comprehensive treaty banning chemical warfare, the greater the institutional resistance against it being signed and ratified will become²¹. Similarly, the more advanced a production programme, the stronger institutional opposition to it being abandoned will grow. However, as Perry Robinson concludes²², "*this in turn would hardly fail to stimulate a more general proliferation of the weapons, including proliferation into regions where they might well acquire a far greater military significance than the existing deployments currently display*".

(ii) *Force integration*, the first promoter of horizontal proliferation Perry Robinson discerned, is the pressure which is exerted on the other members of a military alliance to incorporate novel weaponry in their arsenals. As such, it constitutes a lateral extension of vertical proliferation. The Spring 1986 debates on the US Force Goal to obtain NATO approval for the binary production programme and for deployment in Europe in case of a major international crisis is a case in point²³.

(iii) *The poor man's deterrent apprehension* refers on the one hand to the spread of chemical weapons to Third World countries and on the other to the potential acquisition of a weapon of mass destruction by terrorist organisations. In developing countries, a perceived or real threat to the national security may lie at the base. The fear may be heightened by geographical factors, such as the concentration of economic and cultural activities in large urban centres²⁴. Central governments may also consider chemical weapons to be an effective means of controlling rebellious natives or as a counter-insurgency instrument. Such tactics were employed as early as the 1920s by the British in Afghanistan, and later by US troops in Viêt-Nam. Most recently, thousands of Kurdish civilians and guerillas fell victim to similar Iraqi campaigns. Currently, most attention is focused on the Middle East, where the spread of chemical weapons seems to be closely associated with the proliferation of high technology weaponry, such as ballistic missiles and long-range bombers. Moreover, Arab countries tend to view chemical weapons as a counter-balance for Israel's regional nuclear monopoly.

²¹ Such a process accounted for the US Senate's failure to ratify the Geneva Protocol in the second half of the 1920s. Yet, on 29 March 1922, it had ratified the Washington Treaty, which contained a provision banning the use of chemicals in war. That Treaty never entered into force as France failed to ratify it over a dispute concerning naval forces. However, between 1922 and 1925, year of the signing of the Geneva Protocol, the pro-chemical lobby gathered sufficient momentum to overcome any moral or emotional revulsion amongst politicians and ultimately succeeded in blocking ratification.

²² J.P. Perry Robinson, 1989, p. 122.

²³ For discussion, see: J. Badelt, 1989; H.G. Brauch, October 1989; J.P. Perry Robinson, September 1986; J.P. Zanders, March 1989.

²⁴ Report prepared for the Subcommittee on International Security and Scientific Affairs, 24 April 1984, pp. 19-20.

Nevertheless, actual use is in some instances very difficult to demonstrate beyond any doubt. Some notable cases were the alleged use of yellow rain in Indochina, of mycotoxins in the Gulf war, and more recently, of nerve agents in Angola.

The terrorist threat was often raised during the Reagan legislature²⁵. The European press too occasionally referred to subnational proliferation of chemical weapons. In 1982, for example, phials with chemical agents were reportedly discovered in arms caches of as diverse groups as the PLO in Beirut and neo-nazis in West Germany. The USA apparently saw one of the largest manhunts ever to apprehend a mentally-ill engineer, who had threatened to assassinate the president with a crude nerve agent he had actually made²⁶. In 1986, Shi'ite fighters in Lebanon were accused of launching projectiles containing agents which caused vomiting and diarrhoea into the Burj al-Barajinah refugee camp. These are but a sample of alleged incidents reported in the press and literature.

Few claims, however, have been substantiated with hard evidence. In 1984 a Congressional report noted that "during the last decade, only minor incidents of terrorism using chemical agents [had] occurred, and their effects did not approach the recognized potential of chemical terrorism". The report added that *"while there is a literature on the possibility of terrorists using complicated chemical, biological and radiological (CBR) weapons, it was primarily inspired by the controversy in the mid-1970s over the prospect of theft of nuclear materials, their dissemination as radiological agents, or even their fabrication into crude, low-yield explosive devices by terrorists"*²⁷. The authors, however, agreed with specialist literature that the matter constituted *"an ultimately unknown and as yet unrealized threat"*²⁸, but given the growing sophistication of weaponry used by terrorist organisations *"a greater likelihood of CBR terrorism [...] is plausible"*²⁹. Lately, the overall terrorist threat appraisal appears to have returned to more normal proportions. For example, in a testimony to the US Senate Governmental Affairs Committee early last year³⁰, CIA director Webster suggested that Libya could sell chemical weapons to Middle East states, but added he possessed no evidence that a terrorist group had obtained such weapons.

²⁵ cfr. J.D. Douglass Jr. & N.C. Livingstone, February 1984 and 1987.

²⁶ J.D. Douglass Jr. & N.C. Livingstone, February 1984, p.14.

²⁷ Report prepared for the Subcommittee on International Security and Scientific Affairs, 24 April 1984, p.31.

²⁸ Ibidem, p.34.

²⁹ Ibidem, p.36.

³⁰ R.L. Koenig, 2 February 1989.

(iv) The final promoter of chemical weapons proliferation, *the adversary's lack of chemical defence or deterrent*, is considered to be a major contributing factor in all instances in which chemical weapons have been employed since the First World War. Gas became an important instrument for policing rebellious territories in the colonies during the intra-war years. Moreover, the colonial powers did not consider themselves to be bound by international law as regards indigenous tribes, as treaties were signed between states and not peoples. The Geneva Protocol - which binds parties between themselves - was breached during Italy's Ethiopian campaign and during the Gulf War.

Chemical proliferation is stimulated by an interaction of two or more of these promoters. The relative weight of each of them in that process depends on the circumstances under which it takes place. For example, in an region of high tension, the quest for a chemical capability - either to offset a regional nuclear or conventional monopoly or supremacy or to counter the adversary's chemical threat - might be characterized by little diversification in means of delivery and hasty production of relatively crude agents. On the other hand, the proliferation process may be very slow, during which a wide range of means of delivery are developed for more sophisticated chemical agents, thus giving that country the capacity to fight a major chemical war. Indeed, proliferation mechanisms may be set in motion by a simple fact as the temperament of a single leader, bent on enhancing his stature in the region. In general, much is determined by the extent to which a country or a group of countries feel bound by *de facto* constraints on their acquisition.

Although not much has as yet been written about it, a new form of proliferation seems to be developing, namely that of foreign industrial interests in domestic chemical warfare production programmes. Until recently, in spite of the fact that foreign companies may have provided the technology and raw materials, the actual production of chemical weapons has always been a purely national undertaking. Nowadays, European firms, for example, are increasingly involved in the US binary production programme. The actual 155mm binary artillery shell is being manufactured by a subdivision of the British firm Ferranti. After a £215 million fraud scandal, Ferranti is considered to be financially unstable and parts of the consortium may be up for sale to foreign investors. Dichloride for the Multiple Launch Rocket System (MLRS) binary charge is produced by Combustion Engineering. Mid-November 1988 that firm was taken over by the Swedish-Swiss Brown-Boveri³¹, i.e. by companies from non-NATO states. Although such an evolution may still be limited to and between free-market countries, it raises numerous questions. For one thing, how can a government adapt its chemical weapons production programme to a changing political and strategic environment, if it is controlled

³¹ Communication by J.P. Perry Robinson at the second conference of the Information Network on CBW, London, November 1989.

by foreign industrial interests? Moreover, how can that government guarantee that the manufacturing expertise and secrets will not be used to win similar contracts in other countries? The former question relates to the institutional factor behind the supply of chemical weapons; the latter adds a new qualitative aspect to the problem of horizontal proliferation. As such, this issue requires further investigation, especially with reference to the question whether a subdivision can escape national legislation on chemical weapons export to which the parent company is subjected³².

³² Such type of provision exists, for example, in the Federal Republic. According to §4a of the Weapons of War Control Act, arms traders with West German citizenship pursuing their activities outside the Federal Republic must be registered and their activities licensed by the Federal Government, even if the weaponry was not produced or stored in the Federal Republic.

The proliferation issue during the 80s.

The alleged use of chemical weapons by the Soviet Union in Afghanistan and by some of its client states in Indochina raised concern about proliferation in the West. The Gulf War, however, forced governments of industrial states to act. The increasingly intensive employment of lethal chemicals from 1983 onwards raised many questions as to how Iraq obtained the know-how and base materials for large scale domestic production³³. Early accusations were directed at Warsaw Pact countries. East Germany was said to have begun building a plant for the manufacture of gas in Iraq a few months before the Gulf War broke out in 1980³⁴. Belgian toxicologist, Aubin Heyndrickx also alleged that the USSR had supplied the chemicals. The compounds he had found on the bodies of Iranian soldiers were supposedly unknown in the West, while Iraq did not possess the capability to produce them domestically³⁵. However, by the end of March 1984, the C.I.A. identified a first Western firm as supplier of laboratory technology to Iraq. The intelligence report added that Karl Kolb - a scientific and technical supply company in West Germany - had probably unknowingly aided Baghdad in its quest for nerve gas by delivering a complete pesticides plant. Prior to the shipments, which had been going on for at least two years, the company had obtained all required export licenses from the West German government³⁶. This particular case points to one potential for chemical weapons proliferation that will always be present: whilst the chemical industry probably has little interest in chemical warfare programmes as such, it is very eager to develop an agro- and petro-chemical production base in Third World countries. The trade in pesticides and insecticides is particularly aggressive, as proven by the fact that several toxic chemicals which are banned in industrial countries for health reasons, are still in production in developing countries.

³³ cfr. (-), 5 March 1984; O. Johnston, 6 March 1984. At that time some early reports mentioned the existence of three production plants for chemical agents (M. Getler, 6 March 1984). Iran accused Britain of providing the weapons, a charge initially denied by London (J. Perera, 22 December 1983; (-), 12 January 1984; (-), 5 March 1984; B. Bloom, 7 March 1984).

³⁴ (-), 8 March 1984.

³⁵ G. Yerkey, 13 March 1984.

³⁶ S.M. Hersh, 30 March 1984.

As more countries became known to be implicated in Iraq's chemical production scheme³⁷, many Western governments swiftly adopted regulatory measures. Shortly after the first U.N. report on chemical warfare in the Gulf, the USA intercepted suspect shipments to the belligerents. They had already adopted some export controls in the early sixties. Chemical warfare agents were on the Munitions Control List of the Department of State. Direct precursors to chemical agents, but with civil applications were administered by the Department of Commerce. Other compounds with a primarily civil use were not subjected to export regulations. One shipment to Iraq intercepted in March 1984 consisted of potassium fluoride. This precursor to nerve agents belonged to the latter category. Therefore, representatives of the Departments of Defence, Commerce and the intelligence community reviewed civil-use chemicals and finally drafted a list with five products not to be exported to either belligerent in the Gulf War. Two weeks later, on 30 March 1984, these measures became effective. The industry, which had been consulted on the issue, was requested to provide information on the availability of these commodities to Iran and Iraq from other industrialised countries. The list has been periodically reviewed by the interagency group³⁸.

At the same time, Washington urged other industrial nations to control chemical exports tightly³⁹. On 10 April 1984, the foreign ministers of Belgium, Denmark, the Netherlands, the United Kingdom and West Germany approved a plan to license such shipments. They would press other European Community members to take similar steps. A committee would list the products and countries requiring approval⁴⁰.

The ideas eventually took shape within the framework of the Organisation for Economic Cooperation and Development (OECD). The governments of member countries adopted in concerted fashion a series of export controls on precursor chemicals. The Australian Group - formerly known as the Brussels Club - consists of twenty-one members⁴¹. They have drawn up a core export control list,

³⁷ Late in 1975 Iraq had apparently contacted a US firm, Pfaudler Co, to build a pesticide plant. Although a protocol was signed between both parties on 24 January 1976, the contract was not followed up because the Iraqis were not interested in building a pilot plant first. Iraqi officials then contacted a British firm, ICI, but a contract was eventually signed with an Italian company. After initially denying Iranian charges, British officials acknowledged in April 1984 that in 1983 British firms had shipped large quantities of precursors for nerve agents and mustard gas to both Iran and Iraq. (P. Channon, Minister for Trade, Written reply on 12 April 1984. See also: A. Veitch, 6 April 1984; I. Mather & R. McKie, 13 April 1984; K. DeYoung, 13 April 1984.)

³⁸ Statement of L.H. Olmer, Under Secretary for International Trade, US Department of State. Joint Hearing, 28 June 1984, pp.27-32.

³⁹ S.M. Hersh, 30 March 1984; D. Oberdorfer, 31 March 1984.

⁴⁰ J. Tagliabue, 11 April 1984; K. DeYoung, 13 April 1984.

⁴¹ Early in 1986 these were the E.C. members, Australia, Canada, Japan, New Zealand, Norway and the USA. In September 1987 they were joined by the E.C. Commission and Switzerland and on 8 July 1989 by Austria.

currently comprising 9 products, and a warning-list of 41 chemicals⁴². The measures, however, are taken on a voluntary basis. This implies that national laws are applicable. Each state also determines freely which products it will subject to export controls. All participants have accepted the core export control list of eight chemicals. With the exception of Belgium and the E.C. Commission, they have extended the national export regulations to a varying number of products from the warning list⁴³. Some governments apply the additional list *erga omnes*, others limit the exports to some specified countries, such as Iran and Iraq. The warning list is circulated to the chemical industry as well, so that it can take supplementary voluntary measures. The sector has also been requested to inform governmental agencies of foreign purchase enquiries about these products. In 1984, the Federal Republic also enacted export controls on technology and equipment needed to operate a chemical weapons plant.

Eastern Europe also expressed concern about chemical weapons proliferation. On 15 January 1986, Mikhail Gorbachev proposed a sort of chemical weapons non-proliferation treaty. However, as the proposition also called for the USA and the USSR "*not to transfer chemical weapons and technology to any other part, and not to deploy them in the territory of others*"⁴⁴, it was rejected by the West. Obviously, Gorbachev sought to block any deployment of US binary munitions in Europe as well. In February, Pravda announced that Moscow had promulgated export regulations for chemicals with dual use. A license would only be granted if the importing country formally guaranteed that the chemicals would not be used for military purposes. No exception was made for members of the Council for Mutual Economic Assistance (CMEA)⁴⁵. During March and September, Washington and Moscow held bilateral talks on the spread of chemical weapons in Berne. No results were made public. Similar measures were discussed at a CMEA meeting in Leipzig in 1987. It is not unreasonable to assume that consultation between the OECD and CMEA was promoted as a result of the bilateral discussions, which are still being held.

Some countries, such as Finland and Pakistan enacted such procedures independently⁴⁶. On 28 February 1989, delegates of 28 countries agreed to a draft of a system controlling the *import* of toxic chemicals, which would be administered by the United Nations Environmental Programme. It re-

⁴² See Appendix.

⁴³ West Germany added a ninth product in December 1988, i.e. a couple of weeks before the Imhausen's association with the Rabta plant was disclosed by the USA.

⁴⁴ As quoted by M. Walker, June 1986, pp. 107-108.

⁴⁵ (-), 13 February 1986.

⁴⁶ S.J. Lundin, J.P. Perry Robinson & R. Trapp, 1988, pp. 103-104.

quires exporters of dangerous substances to receive written approval from participating states before shipment of the chemicals. In practice the UN would distribute a list of dangerous chemicals to the participating countries. After receiving confirmation from the country accepting the importation of the substance, the agency would notify the government of the exporting country, which in turn informs the seller⁴⁷. The system was devised to reduce safety hazards from pesticides in Third World countries. Nevertheless, it was believed to be a useful instrument for monitoring trade in potential precursors for nerve agents.

After 1986, members of the Australian Group continued to expand the scope of the export controls. On 10 August 1987, the US extended the export rules to all countries, with the exception of 18 industrialized ones. At the December 1988 session, the Australian Group added thionyl chloride as ninth product to the core export control list. However, after the Rabta affair, officials acknowledged that the legislation still contained numerous loopholes, especially regarding technology transfers. At the end of January 1989, the West German government, on the other hand, launched a diplomatic offensive to repair its tarnished image. After ensuring Spain's support, then chairing the E.C. Ministerial Council, for measures within the framework of the European Political Cooperation, Bonn urged Jacques Delors to place export controls on the agenda of the E.C. Commission at the earliest possible date. On 20 February 1989, the Commission adopted the regulation⁴⁸ - almost five years after it had originally been rejected by France, Greece and Denmark on grounds of its military-related nature. At the International Government-Industry Conference against Chemical Weapons, which was held in Canberra from 18 to 22 September 1989, the USA announced it would expand its control list to 50 dual-use chemicals⁴⁹. In December 1989, all Australian Group members adopted that warning list.

Within the framework of the Australian Group, governments also share intelligence on the involvement of particular firms in the construction or supply of chemical weapons plants. As a result, shipments could be traced to their sources and governments were able to proceed with legal investigations. By the end of 1986, the Federal Republic was investigating twelve firms. However, as no laws or regulations had been broken, charges eventually had to be dropped. Similar situations arose in other countries. In fact, between 1984 and the present, only one firm in a member country of the Australian Group was taken to court successfully. In 1985, Dutch officials raided Melchemie, a small

⁴⁷ Arms Control Reporter, Entry: 17 February 1989, p. 704.B.371 (3-89).

⁴⁸ Council Regulation (EEC) N° 428/89 of 20 February 1989 concerning the export of certain chemical products. Published in: Official Journal of the European Communities, 22 February 1989, N° L50/1-50/2.

⁴⁹ USIS, 22 September 1989, pp.2-3.

trading firm in Arnhem, and seized documents proving that chemicals on the export control list had been shipped to Iraq. The next year, the firm was fined 100,000 Dutch Guilders and faced a one year shutdown in case of repetition. Less spectacular, but by far more efficacious, are the instances in which diplomacy actually prevents the conscious or unwitting participation of Western companies in the chemical warfare programmes of Third World regimes. In one of the latest documented cases⁵⁰, the US Government succeeded in preventing a Dutch subsidiary of British firm from constructing a potential chemical weapons plant in Iran. Suspicions were aroused as the pesticide plant was to process phosphorous pentasulphide, a key precursor to the nerve agent VX. After US lobbying within the Australian Group, the Dutch Government interceded to block the sale. The Hague was guaranteed confidentiality, a key condition for ensuring maximal cooperation. Swiss and Italian firms, subsequently approached by Teheran, also pulled out of negotiations after US pressure. European diplomats now believe construction has been halted.

⁵⁰ I. Mather & S. Grant, 4 February 1990.

Libya's alleged involvement in CW-programmes: 1980-90

During the second half of the 1970s, Western sources started reporting an increasing number of infringements on the chemical warfare regime by Soviet client states. At the same time, an enormous gap between Warsaw Pact and NATO forces was "discovered". The information, usually from intelligence sources, was all but verifiable. This renewed attention may have resulted from a resumption of the negotiations on a chemical warfare ban on the one hand, and from institutional pressure in the USA to recommence chemical weapons production on the other. During the first half of the 80s, the debates on both aspects intensified, the latter in particular being fuelled by allegations of Soviet forces employing chemical agents in Afghanistan and the yellow rain controversy in South-East Asia. From December 1983 onwards, claims of Iraqi chemical attacks started gaining more credibility.

Parallel to these developments, the number of countries alleged to be possessor states also rose sharply. The CIA named Libya, as well as other Middle East countries, for the first time in its *Special National Intelligence Estimate 11-17-83* of 15 September 1983⁵¹. According to unspecified reports, Qadhafi, who was increasingly being linked to international terrorism, received a ton of the nerve agent tabun from France⁵². As the terrorist threat was reaching near-hysteria in Washington after a series of attacks on US military personnel and installations in Europe, security advisers more and more reckoned with chemical attacks by terrorist organisations (of marxist-leninist signature)⁵³. The campaign peaked on 15 April 1986, when US planes bombed Tripoli in revenge for an attack on US servicemen in Berlin, in which Libya was believed to be involved. That summer, the USA conducted large military manoeuvres, some together with Egypt, near the Libyan borders and consulted its European allies on economic sanctions. Both Great Britain and the Federal Republic took steps to limit the sale of technology with potential military application to Tripoli⁵⁴. Nevertheless, accusations

⁵¹ J.P. Perry Robinson, 1985, p. 172.

⁵² J.D. Douglass Jr. & N.C. Livingstone, February 1984, p.18

⁵³ Ibidem, pp. 18-22; W. Beecher, 7 February 1989.

⁵⁴ B. Gwertzman, 29 August 1986.

of Tripoli's chemical capability were contradicted by a 1984 Israeli report, stating that the Libyan stockpile was unconfirmed⁵⁵.

Throughout 1986 reports on Libya's chemical capability were conflicting. British intelligence sources asserted that the USSR had supplied nerve agent warheads for Scud-B missiles. US officials claimed that Libya's chemical weapons production capability had been assisted by exports from Western Europe⁵⁶. However, official reports and testimonies, for instance to US Congress, did not mention Libya amongst the significant possessors of chemical weapons. Unofficial accusations still appeared to be derived from the 1983 *Special National Intelligence Estimate*⁵⁷.

During the Gulf War, Tripoli was accused of either helping Iran acquiring a chemical production capability or of supplying it with chemical agents. Teheran fiercely denied intentions to obtain a chemical capability. According to an article in the British *Sunday Telegraph* of 23 November 1986, quoting British intelligence sources, Tripoli had passed on the Soviet Scud-B warheads to Syria and Iran. The Soviets vehemently denied supplying Libya with chemically capable warheads⁵⁸. The story, however, seems to be completely contradicted by a deal between both countries involving the exchange of Soviet supplied sophisticated anti-shiping mines for Iran in return for chemical weapons for Libyan forces in Chad. The Soviet intervention to block the shipment of mines to the Gulf upholds that part of the report. However, many doubts persisted as to the transfer of chemicals. US officials questioned their own initial intelligence reports and a special mission with an SR-71 reconnaissance plane failed to produce photographic evidence of the shipment⁵⁹. The incident, notwithstanding, implies that at that time Libya either did not possess chemical weapons or that its stocks were insufficient to sustain a chemical campaign in the limited war with Chad. In December 1986, Libya had been accused by the Chadian government of President Habré of using chemicals and napalm against their troops⁶⁰. The claims were repeated in September 1987, apparently after the announcement of a cease-fire on the eleventh. The USA supported the assertions and had already sent 2,000 gas masks to Chad a month earlier⁶¹. US sources added that Tripoli had already employed chemical

⁵⁵ The Middle East Military Balance 1984, published by the Jaffee Center for Strategic Studies (Tel Aviv), as quoted by J.P. Perry Robinson, 1987, pp. 110-111, Table 5.4 + notes.

⁵⁶ J.P. Perry Robinson, 1987, pp. 110-111, Table 5.4 + notes.

⁵⁷ S.J. Lundin, J.P. Perry Robinson & R. Trapp, 1988, p. 102.

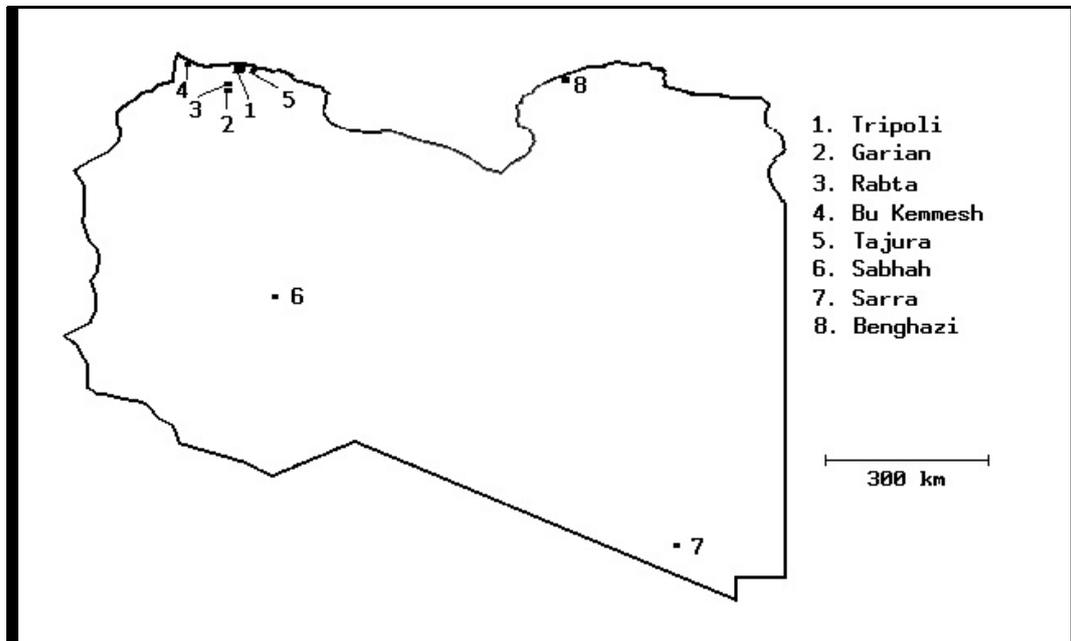
⁵⁸ As quoted in: Arms Control Reporter, Entry 23 November 1986, pp. 704.B.207/208 (1-87).

⁵⁹ E. Sciolino, 12 September 1987.

⁶⁰ (-), 13 December 1986.

⁶¹ M.R. Gordon, 26 December 1987.

warfare agents during the 1983 war with Chad. The attack backfired, killing a number of Libyan soldiers, as a result of malfunctioning munitions or the wind blowing in the wrong direction⁶². The accusations, however, have never been corroborated by independent sources, not even by members of the French forces present in Chad. The Chadian permanent representative to the United Nations did not refer to these accusations in his August 1987 report on the war to the UN Security Council.



Libya's alleged chemical weapons production sites: 1980-1990.

The Chadian claims nevertheless gave rise to Western speculation on Libyan chemical weapons production sites. The West German intelligence service had reported as early as April 1980 that Qadhafi wanted to establish a domestic production installation and was trying to obtain the raw materials from European countries. In July 1983, it informed the Bonn government that the plant was located near Bu Kemmesh (Abu Kammash) and had started production of mustard gas at the end of 1981. It finally had to rescind its assessment in October 1988⁶³. In the meantime, the service, which was receiving numerous reports from both Western and Eastern sources that German firms were involved in the construction of a chemical weapons production plant, focused on the nuclear re-

⁶² Nightline, ABC-Network, 3 January 1989, 11:30 p.m. (Transcript in: Current News, Special Edition, Chemical Weapons, n° 1774, 31 January 1989.)

⁶³ *Unterrichtung durch die Bundesregierung*, 15 February 1989, pp. 4-5.

search centre at Tajura. In January 1986, it stated that a section for the production of mustard gas had been newly constructed. A month later, the centre was also connected to the manufacture of the nerve agent sarin. An intelligence briefing on 22 June 1987 referred for the first time to Rabta, just north of Garian. The plant was expected to start daily production of 1-3 tons of sarin from September 1987 onwards⁶⁴. During the second half of 1988, new details started emerging at a dramatic pace in the Federal Republic. At the beginning of 1988, US sources from their side pointed to a site at Matan-as-Sarra, in the south-eastern corner of Libya and about a hundred kilometres above the border with Chad. The article in *The Christian Science Monitor*⁶⁵ stated further that the summer before the base had been overrun by Chadian forces "but subsequently rebuilt and beefed up by Libya". Reports at the time of the attack, however, only mention an airfield with a hard runway, which played a key role for Libyan air strikes on Chadian villages⁶⁶. No other open reports seem to mention this site. A various times, some other locations were cited, such as the region around Sabhah in south-west Libya⁶⁷. Nevertheless, at the height of the Rabta crisis US officials indicated they had several other sites under surveillance⁶⁸. In September 1989, a German construction firm completed an underground air base for Libya, which had full NBC protective equipment. Apparently, similar bases had been constructed in Israel, Saudi Arabia and Iraq, indicating the seriousness of the proliferation in the region⁶⁹.

While the crisis over the Rabta complex was reaching its climax in mid-January 1989, Libya was once again accused of launching chemical attacks. Sudanese rebels claimed that in late 1988 Libyan pilots, flying for the Khartoum government, which incidentally was also backed by the USA, dropped chemical bombs on a garrison at Nasir in southern Sudan⁷⁰. Allegations were denied by all sides involved. Tripoli was said to have flown chemicals it had obtained from Iran into Somalia on 7 October 1988. Francesco Rutelli of Italy's Radical party, asserted that these agents had been used to

⁶⁴ *Unterrichtung durch die Bundesregierung*, 15 February 1989, pp. 5-7.

⁶⁵ 5 February 1988, as quoted in: *Arms Control Reporter*, p. 704.B.257 (3-88).

⁶⁶ (-), 7 September 1987.

⁶⁷ Letter dated 28 October 1987 from the West German embassy in Tripoli, quoted in *Bericht der Bundesregierung*, 15 February 1989, p.7. Details were to be communicated at a later date, when available. The report by the Federal Government makes no further mention of Sabhah.

⁶⁸ E.A. Wayne & G. Thatcher, 13 January 1989.

⁶⁹ *Arms Control Reporter*, Entry: September 1989, pp. 704.B.395-396 (9-89).

⁷⁰ R. Pear, 11 January 1989.

The Sudanese Government of the democratically elected Prime minister Sadeq al-Mahdi was supported by the United States. However, he also enjoyed Libya's support for his policy of islamization and in his war against the animistic and christian south. Washington repeatedly expressed its annoyance about the close relationship with Tripoli. He was ousted in a bloodless coup on 30 June 1989. The new leadership shares Qadhafi's revolutionary and pan-arabian ideas.

bombard rebels in northern Somalia, adding that the Somali president had been to Libya to obtain more chemical weapons. These charges too were disavowed by both governments⁷¹.

On 7 March 1990, an anonymous spokesperson for the US Administration claimed that the Rabta plant had begun manufacturing of small quantities of mustard and nerve agents. Operational capability had only been achieved at the end of last year. However, the facility had not yet reached full production capacity. Libya still maintained that it only possesses a pharmaceutical plant near Rabta⁷² and that the new accusations are part of a new US disinformation campaign. On television, the Libyan Ambassador to the United Nations, Ali Treiki, declared that a statement had been given to the Secretary General denying any Libyan intention to produce chemical weapons. When challenged by Neil Livingstone, a terrorism expert in the Reagan Administration, the Ambassador failed to name what pharmaceuticals are being manufactured at the plant, claiming he is not an expert. However, he added that Libya is ready to open up the Rabta plant for inspection by the United Nations⁷³.

According to the US Defence Intelligence Agency, already as much as 30 tons of mustard gas may have been produced. Another building for filling the chemical agent into plastic containers has just been completed. Sufficient containers for 150 bombs are thought to be ready, while every day five new ones are being added to the stockpile⁷⁴. The intelligence report added further that the plant is now under complete Libyan military control and that it is ready for full-scale manufacturing of mustard gas and nerve agents⁷⁵. However, the West German intelligence service, which had been briefing the USA on the new developments for several months, rejected the possibility of a nerve agent production capability. It added that the Libyans had been using makeshift production methods for the 30 tons of blister agent, resulting in extensive corrosion to the unsuited equipment⁷⁶.

The renewed allegations, of course, raise questions about their timing. Contrary to the previous year, few circumstantial indications are available. White House Press Secretary, Marlin Fitzwater, for one thing, hinted that industrial countries were once more involved in Libya's chemical warfare

⁷¹ Arms Control Reporter, Entry: 9 January 1989, p. 704.B.330 (2-89).

⁷² Headline News, Cable Network News (C.N.N.), 7 March 1990, noon C.E.T.

⁷³ The World Today, Cable Network News (C.N.N.), 8 March 1990, 00:15 h. C.E.T.

⁷⁴ (-), 8 March 1990; M.R. Gordon, 9 March 1990.

⁷⁵ P. Pringle, 8 March 1990.

⁷⁶ (-) [1], 9 March 1990.

programme⁷⁷. Although he declined to name any of them, some reports have suggested West German companies and specialists are implicated again⁷⁸. General of the reserves and former head of the Israeli military intelligence service Aharon Levrant affirmed that "*despite the official withdrawal of West German firms from Libya, it seems that dozens of engineers and technicians have continued to work privately at Rabta*"⁷⁹. Although the Federal Government had promulgated a law expressly forbidding German nationals to work at the Rabta plant, the assertions of renewed German involvement followed shortly after a very critical article in the leading newsmagazine *Die Zeit*, accusing Kohl of being very lax in implementing new regulations and of failing to enact new laws announced at the Canberra Conference in September 1989⁸⁰. On the other hand, the disclosures also came after a row between Bonn and Washington over the Libyan chemical treat. Foreign Minister Genscher's proposal for an international inspection with the aim of inducing Libya to cease production of chemical warfare agents at a meeting of West European foreign ministers on 17 February 1990 drew a sharp rebuke from the Bush Administration three days later. The German Ambassador to the USA, who was summoned to the State Department on 23 February, was told that Washington would accept nothing less than a dismantlement of the Rabta plant⁸¹. In a rerun of events in January 1989, the White House may have decided to disclose its information.

On the other hand, Washington might be moving to isolate Qadhafi from the other Arab countries. During the last couple of months, Colonel Qadhafi has retreated to the background of international politics and made efforts to solve outstanding conflicts with neighbouring countries. However, only a couple of days after the US disclosures, the Libyan leader and General Omar Hassan Ahmed Bashir, Sudanese military ruler since June 1989, announced they would sign integration pacts that would unite both nations in four years time. Sudan is the largest country in Africa⁸². The move is being interpreted as a provocation against Egypt, which supported the Islamic regime in order to weaken the ties between Khartoum and Tripoli⁸³. By suggesting that Tripoli's acquisition of a weapon of mass destruction poses a real military threat to the region, and even to other Arab countries who have just

⁷⁷ D. McDonald, 8 March 1990.

⁷⁸ (-) [3], 9 March 1990.

⁷⁹ M. Henry, 9 March 1990.

⁸⁰ W. Hoffmann, 23 February 1990.

⁸¹ M.R. Gordon, 9 March 1990.

⁸² (-), 5 March 1990.

⁸³ (-) [3], 9 March 1990.

formed the Arab Cooperation Council, President Bush may perhaps hope his claim will spark off Arab diplomatic activity to prevent the undoing of the fragile regional geopolitical balance.

Nevertheless, hints by the Bush Administration that it might take out the site by military means, are likely to increase tension in the Middle East once more.

West Germany's Export Policy.

The Imhausen-Rabta affair is but one example of German export scandals involving technology and materials for the development and production of advanced weaponry. One of the leading experts on arms transfers, Michael Brzoska, attributes these cases to a combination of weak laws, economic interest and an export-oriented ideology, based on fear of losing competitiveness on the world market. Moreover, as the Federal Republic has limited political ambitions outside its own region, it displays an unjudgemental attitude towards many kinds of Third World regimes, such as Qadhafi's, on the one hand and has few out-of-area interests to promote through export rules on the other⁸⁴. However, regarding the latter point, Bonn's policies are no worse than those of many other capitals. For instance, France and West Germany both perceive the need for an independent arms industry. Limited domestic demand and the resulting high cost per unit increase pressures for sales abroad. France, by contrast, claims widespread security concerns in overseas territories, in particular in the Middle East and North Africa. It too has few problems in recognizing, for example, the legitimacy of Libya's leadership when economic interests are involved. Although both sides recently faced each other in Chad, Paris is already reconsidering the postponed sale of advanced warplanes to Qadhafi. For similar reasons, after the cease-fire, Paris was in a rush to restore economic ties with both belligerents in the Gulf War, although it had supported Iraq during the hostilities. Two likely explanations why these policies do not generally lead to a public outcry in France are the broad national consensus on security matters and the government's endorsement or even active promotion of such arms transfers.

Nevertheless, the general atmosphere generated by West Germany's export-oriented trade policy has beyond any doubt contributed to many of the scandals. Since 1952 exports have continuously surpassed imports. The annual surplus on the balance of trade rose from 706 million DM in 1952 to a first record high of 50.8 billion DM in 1974. After several lean years, a new steep rise started in 1986 (53.6 billion DM), crossing the 70 billion DM barrier in 1987. Officials justify this export drive by pointing to trade deficits in other sectors, such as services. Germany's high population density and lack of

⁸⁴ M. Brzoska, July 1989, pp.32-33. However, during the summer of 1986, West Germany, at US request, moved to limit its contacts with Tripoli (B. Gwertzman, 28 August 1986).

natural resources underlie the government's constant concern with world trade. On it depend investments, revenues, employment - one person in four works for the export - and the standard of living⁸⁵.

In spite of the pre-eminent free market climate, West Germany has enacted several export control mechanisms. According to Art. 26, §2 of the Federal Constitution governmental permission is required to manufacture, forward or transport weapons⁸⁶. Arms transfers are additionally regulated by the Weapons of War Control Act (*Gesetz über die Kontrolle von Kriegswaffen*, often called *Kriegswaffenkontrollgesetz*) of 20 April 1961 and subsequent amendments; the Foreign Trade Act (*Außenwirtschaftsgesetz*) of 28 April 1961 and amendments; and the Foreign Trade Order (*Politische Grundsätze der Bundesregierung für den Export von Kriegswaffen und sonstigen Rüstungsgütern*, also known as *Außenwirtschaftsverordnung*) of 28 April 1982.

Given the export-oriented climate, it comes as no surprise that the high unemployment statistics during the first half of the 80s increased pressure on the Federal Government to ease up on arms export restrictions. Budget constraints also led to a sharp decline of domestic orders for weaponry. The strict interpretation of the regulations under Chancellor Brandt during the 70s was abandoned near the end of Schmidt's tenure in 1982⁸⁷. The German arms industry, which became closely interconnected and thus more powerful and competitive after a series of take-overs, forced Chancellor Kohl into relaxing export controls even further. It mainly argued the preservation of jobs and technological progress in key military areas. Kohl himself deflected any potential criticism and reference to Germany's military past by asserting that he belongs to "a post-war generation, that prefers to look forward without dwelling on the past"⁸⁸.

In 1988 the FRG sold major weapon systems abroad for a total value of \$1,455 million, representing $\pm 0.2\%$ of all exports. It ranked sixth amongst the world's leading arms suppliers⁸⁹. Members of the Federal Government nevertheless consider these laws to be very restrictive and in the interest of the West German economy:

"Our position is clear! We shall stick to our restrictive weapons export. This conforms to our historical responsibilities and the ethical foundation of our foreign policy and it conforms to our economic

⁸⁵ Tatsachen über Deutschland, p. 194; Britannica Book of the Year, 1989, Entry: "Germany, Federal Republic of". All figures are in current prices.

⁸⁶ "Zur Kriegführung bestimmte Waffen dürfen nur mit Genehmigung der Bundesregierung hergestellt, befördert und in Verkehr gebracht werden."

⁸⁷ M. Brzoska, July 1989, p.33.

⁸⁸ W. Getler, 29 August 1986.

⁸⁹ I. Anthony, 1989, p. 199, Table 6.2.

interests. An extensive weapons export policy - which means primarily arms transfers to the Middle East - would harm our international relations and would put jobs in Germany at risk. We are now the prime exporter of civil products to the Middle East. We would lose a part of these markets if we were to go into arms sales. [...]⁹⁰

The Weapons of War Control Act covers only weapons specifically designed for use in war, but not their components or know-how. "Weapons" are defined and listed in an annex to the Act, which is periodically revised⁹¹. The implementation of this law thus bears no relevance to the present discussion of chemical weapons proliferation. The Foreign Trade Act applies to all other military related products subjected to export controls. These are also listed in an annex. It was adopted to comply with agreements made within the Coordinating Council on Mutual East-West Trade (COCOM). The regulations also apply to sales to the Third World. In 1982, the Act was supplemented by the Foreign Trade order, specifying a number of political guidelines for issuing export licenses.

The Federal Economy Office, an agency under the Ministry of Economics in Eschborn im Taunus, is responsible for licensing the sales under the Foreign Trade Act. Politically sensitive sales need the approval of the ministers for Foreign Affairs, of Defence and Economics. If necessary, the Federal Security Council (*Bundessicherheitsrat*) is also consulted. Its decisions are irrevocable. Rejections of applications under the *Kriegswaffenkontrollgesetz* cannot be appealed. The *Außenwirtschaftsgesetz*, by contrast, contains no such provision. However, in Eschborn a staff of about 80 must review some 80,000 export license applications per year. Few people possess the necessary technical expertise⁹². These circumstances reduce the effect of the regulations to a large extent.

Export controls on precursors for chemical agents are specified in Orders altering the *Außenwirtschaftsverordnung*. Order 52, containing a first list, entered into force on 15 May 1984. It was supplemented by an additional list on 15 December 1986 (Order 57). On 9 August 1984, Order 56 modifying the Foreign Trade Order and Order 53 modifying the export list for chemicals, supplemented the original list with a Section D. It decreed Federal approval for the export of chemical plants, parts of plants or equipment "which may be suited for research, production, processing or testing of organo-phosphorous compounds, mustard gas or other highly toxic compounds". However,

⁹⁰ From a press-release by Foreign Minister Genscher, 19 January 1987, as quoted in *Stichworte zur Sicherheitspolitik, Presse- und Informationsdienst der Bundesregierung*, February 1987, p.48.

⁹¹ A. Courades Allebeck, 1989, p. 329. Many of the technical aspects are taken from the feature *Rüstungsexportpolitik* in *Stichworte zur Sicherheitspolitik, Presse- und Informationsdienst der Bundesregierung*, January 1987, pp. 13-19.

⁹² M. Brzoska, July 1989, p.33.

the license is not required for exports to other O.E.C.D countries⁹³. On 15 November 1984, following indications that German firms were involved in the construction of a chemical weapons plant in Libya, the Federal Economy Office was instructed that all export applications for products listed under Section D for that country had to be submitted to the Federal Government. This was extended to all listed products on 22 January 1986.

Certainly if compared with Belgium, the West German customs possess extensive powers to trace and curb export infractions⁹⁴. The service is organized both vertically and horizontally. At the local level, customs officers check all incoming and outgoing goods on trade prohibitions and restrictions. An exportation confirmation is entered on the export declaration, which is then sent to the Federal Administration for Statistics. The customs may demand extra documents, such as a declaration by the Ministry for Economic Affairs allowing the exportation. In case of doubt, they call in specialists from the Federal Economy Office or from other authorities. Additionally, 105 specially trained customs officers regularly check balances, records and other documents of firms to ascertain their compliance with export regulations. The companies are legally required to hand over all documents and to assist customs officers. About 1,500 such controls are carried out annually, of which 2/3 concern exports and 1/3 imports. If necessary, special series of controls are carried out. These checks on international trade activities, however, do not imply that the company is suspected of violating regulations. In case of irregularities, customs officers may act on behalf of the Public Prosecutor. In this capacity they proceed with criminal investigations independently of the regular police forces. They possess the same rights as the judicial police and can search premises, make seizures or initiate other judicial inquiries.

Notwithstanding, the Foreign Trade Act guarantees the free market principles to a maximum. Restrictions must be conceived in such a way, that they cause the least possible hindrance to the freedom of economic activities⁹⁵. If an export license is refused, the Federal Economy Office must justify its refusal. One of the few possible justifications summed up in §7 of the law is the risk of disturbing the peaceful co-existence between two states. On the other hand, the Act also insists on safeguard-

⁹³ *Unterrichtung durch die Bundesregierung*, 15 February 1989, pp. 2 + 28.

⁹⁴ *Unterrichtung durch die Bundesregierung*, 15 February 1989, pp. 28-30.

⁹⁵ "*Beschränkungen [...] sind so zu gestalten, daß in die Freiheit der Wirtschaftlichen Tätigkeit so wenig wie möglich eingegriffen wird.*" As quoted in: B. Adam, E. Remacle, Et Al., March 1989, p. 31. Brzoska testifies that the control regime was so lax that firms which had illegally exported weapons or technology only received short probation terms. One court ruling said that the company being tried "had been led to believe, by experience, that the government was not very intent on enforcing controls", thus creating an environment which "made it easier for them to decide to carry out their misdeeds". (July 1989, pp. 33-34)

ing domestic economic interests, which for this reason may supersede any consideration of peaceful co-existence⁹⁶.

Together with the governmental report on the German involvement with the Rabta plant, Chancellor Kohl submitted a series of proposals to enhance export controls on strategic chemicals, substances for biological weapons and on related technologies and equipment⁹⁷. On the one hand, the Federal Government seeks to improve the existing database and the exchange of data between the different services and the industry. Special arrangements will be negotiated with the latter to protect industrial secrets. Consultations regarding the sale of specialized agro-chemical or pharmaceutical plants are also planned. The German chemical industry has already declared its willingness to cooperate on the matter. Other measures intend to ameliorate collaboration between the different judicial services and the customs. On the other hand, Kohl proposed a strengthening of the export control regime and a stiffening of punitive measures. The number of chemical compounds requiring an export licence would be increased to seventeen, while the extended list of - at that time - 35 products would be circulated to the chemical industry. The technology export list is to be supplemented with equipment items for manufacturing biological weapons. Export and transit controls and licensing requirements will be extended to all destinations, rather than be limited to certain sensitive countries. The only exception are other O.E.C.D. members⁹⁸, because they all have more or less similar export regulations and because in any case, the intense trade between those countries makes systematic control impractical. The Federal Government also planned to increase the number of customs officers and add new specifications to the end-use certificate. The transfer of chemicals and components to produce chemical and biological weapons would henceforth also be submitted to the Weapons of War Control Act⁹⁹. As such, infringing Federal trade regulations abroad would become convictable. Violators risk between 2 and 15 years imprisonment and fines up to 1 million Marks. In addition, a part of the company's net profit may be impounded.

Some measures were passed on 15 March 1989 and entered into force on 1 April. On 4 October another 17 chemicals were submitted to export licenses. However, decisions on some of the more profound regulations, such as those proposed in the Bill to Improve the Control of Foreign Trade and to Ban Nuclear, Biological and Chemical Weapons (*Gesetzesentwurf zur "Verbesserung der*

⁹⁶ B. Adam, E. Remacle, Et Al.; March 1989, p.31.

⁹⁷ *Unterrichtung durch die Bundesregierung*, 15 February 1989, pp. 23-27 + Annex 2.

⁹⁸ Australia, Austria, Belgium, Canada, Commission of the European Communities, Denmark, Federal Republic of Germany, Finland, France, Greece, Iceland, Ireland, Italy, Japan, Luxembourg, The Netherlands, New Zealand, Norway, Portugal, Spain, Sweden, Switzerland, Turkey, United Kingdom, United States of America and Yugoslavia.

⁹⁹ Exception is made for technology to destroy such weapons and facilities.

Überwachung des Außenwirtschaftsverkehrs und zum Verbot von Atomwaffen, biologischen und chemischen Waffen)¹⁰⁰, were repeatedly postponed and the Government failed to meet its 1 January 1990 deadline. Delaying tactics by the CDU/CSU christian-democratic parties is blamed. Amongst the proposed regulations not yet implemented are the persecution of people working abroad on forbidden projects and the inclusion of scientific research in the three types of armament. Moreover, both parties wish to reduce the suggested prison sentences. The delays have increased frictions with Washington once more, resulting in the US refusal to relax certain COCOM restrictions¹⁰¹ and are possibly the cause for the new disclosures concerning Libya's chemical warfare programme in March 1990.

¹⁰⁰ *Stand der Gesetzgebung des Bundes. 61. Lieferung vom 6.6.1989, E. Wirtschaft E16.* In this document, the Federal Government indicated its opposition to the bill, whereas the *Bundesrat* supported it.

¹⁰¹ W. Hoffmann, 23 February 1990.

Belgian export procedures for strategic commodities.

Belgian export controls on strategic chemicals fall under orders implementing the Act concerning the import, export and transit of commodities of 11 September 1962. It has been supplemented by the Act of 19 July 1968. These laws also regulate arms sales. Following the agreements within the Australian Group, the Ministry for Economic Affairs listed five key precursors for chemical weapons in the Ministerial Order of 20 June 1984 "changing the Ministerial Order of 23 November 1978 submitting the export of certain commodities to a license". A second similar Ministerial Order was promulgated on 5 January 1987¹⁰², adding an extra three chemicals to the list. These have been replaced by a new Order regulating the export of nine chemicals and a second one regulating their transit over Belgian territory¹⁰³.

According to a manual used by shipping companies, *strategic products* are broadly defined by the political, economic and military value assigned to them by the international community¹⁰⁴. Related special technologies are covered by the term. *Technologies* are described further as "data other than those usually provided to the general public and which contain information concerning the design, production, testing or use (installation, exploitation, maintenance, repairs, and revision) of goods, systems and methods.

The 11 September 1962 Act stipulates four general principles the government must take into account when granting an export license¹⁰⁵:

- the protection of Belgium's economic interests;
- safeguarding internal and external security;
- complying with international treaties and engagements, as well as decisions and recommendations by international or supranational organisations; and
- observance of general legal and humanitarian principles.

¹⁰² Belgisch Staatsblad/Le Moniteur Belge, 13 July 1984 and 15 January 1987 respectively.

¹⁰³ Belgisch Staatsblad/Le Moniteur Belge, 20 December 1989.

¹⁰⁴ *Import-Export, Hoofdstuk 8.1.4: Strategische producten*, 12 December 1988, pp. 23-28.

¹⁰⁵ A note dated 19 March 1981 from the Minister for Foreign Relations indicated some other principles with direct reference to the arms trade. As these do not change the content of the law, they have little bearing on the present discussion. For an enumeration, see B. Adam, November 1988, pp. 14-15.

The latter condition, however, is difficult to apply as humanitarian principles are not defined clearly by international law. The Act of 19 July 1968 permits the authorities to submit any commodity to a licensing system. Nevertheless, compared with the 1962 Act the government has limited its competence for granting licenses. One analyst commented¹⁰⁶:

"The Belgian government did not want to provide itself with a legal tool permitting it to expand its power over arms export controls, that is at any time subject to a general law on international trade. The government's most important motivation, as stated explicitly during the parliamentary debates, was based on the will not to hinder the freedom of trade.

"This attitude is the result of a perfect symbiosis between the political world and the industrial milieu. Considerations are economic rather than moral."

To obtain a license for exporting or transiting strategic commodities, a firm must apply to the Central Service for Contingents and Licenses (*Centrale Dienst voor Contingenten en Vergunningen*) of the Ministry for Economic Affairs. This service consults the General Political Directorate (*Algemene Directie van de Politiek*) within the Ministry for Foreign Affairs for political advice. The application is subsequently submitted to an interministerial committee composed of representatives of the Ministers for Foreign Relations, Foreign Trade, Economic Affairs, Defence, of Home Affairs and of Justice. The political decisions are taken following the principles included in the Acts of 11 September 1962 and 19 July 1968.

The Central Service for Contingents and Licenses follows a different procedure when the recipient is a government of a NATO ally or when it only involves small quantities to other countries. For all other countries or for shipments to private enterprises, the application is transmitted to the General Political Directorate.

For his political advice, the Foreign Minister consults a list defining seven country categories:

1. NATO members and countries with an equal status:
Australia, Austria, Finland, Ireland, Japan, New Zealand, Sweden and Switzerland.
2. Communist countries:
Afghanistan, Albania, Bulgaria, China, Czechoslovakia, German Democratic Republic, Hungary, Kampuchea, Laos, Mongolia, North Korea, Poland, Rumania, Viêt-Nam and the USSR.
3. Countries under complete embargo:
The Bantustans, Namibia (South West Africa), South Africa and Taiwan.
4. Countries under temporary embargo:
Chili, Cuba, El Salvador, Ethiopia, Nicaragua, Paraguay, Sri Lanka, South Yemen and Syria.
5. Countries under the measure "suspension of licenses":
Iran, Iraq, Libya and Surinam.
6. Sensitive countries:
most of the Third World states.
7. All other countries:
neutral countries.

¹⁰⁶ B. Adam, November 1988, p.13.

The list is secret and only issued to the Central Service for Contingents and Licenses and the customs. The latest circular letter known dated 16 February 1987 bears reference number DL 3/15755. It reflects the situation from December 1986 onwards¹⁰⁷. Purveyors, on the other hand, only possess a simplified list made up of three categories¹⁰⁸:

1. COCOM members:
Belgium, Canada, Denmark, Federal Republic of Germany, Greece, Italy, Japan, Luxembourg, The Netherlands, Norway, Portugal, Turkey, United Kingdom, United States.
2. Austria, Finland, Hong-Kong, Ireland, Sweden, Switzerland, Yugoslavia.
3. All other countries not listed under 1 and 2.

The disparity between both lists is striking, more so as the apparently exhaustive category "COCOM members" does not include NATO allies, such as France, Iceland and Spain, whereas Japan is listed. The second grouping, which partially corresponds to the list of countries with a status equal to that of NATO members, rather surprisingly contains Hong Kong and Yugoslavia¹⁰⁹. Hong Kong in particular played an important role in the Imhausen-Rabta affair.

If the addressee is a private enterprise in a NATO country or a country with an equal status, advice is given by the competent service of the General Political Directorate only. Applications for licenses for countries under complete embargo are immediately rejected by the Central Service for Contingents and Licenses. Exports to states listed under temporary embargo or under "suspension of licenses" are in principle refused by the interministerial committee. The COCOM guidelines govern exports to communist countries. All other categories follow standard routine procedures. In case the interministerial committee does not arrive at a unanimous conclusion, the application is transferred to the Minister Committee for Foreign Relations.

The most important documents needed to apply for a license are: the international import certificate (*internationaal invoergetuigschrift*), the end-use certificate (*eindbestemmingscertificaat*) and the certificate of delivery on location (*verbintenis van niet-wederuitvoer*). The international import certificate is a document accepted by NATO, for use by private firms established in NATO members or in countries with an equal status. The government of the importing country bears the political responsibility of the transaction and declares that any possible reexportation will not occur without its permission. The certificate of delivery on location, i.e. of non-reexportation, is required in all cases. This is a purely Belgian document for domestic use. The Belgian purveyor must sign it, compelling him to prove the goods have indeed arrived at the indi-

¹⁰⁷ *Parlementair Onderzoek*, 28 February 1989, pp. 77 + 79.

¹⁰⁸ *Import-Export*, 12 December 1988, p. 24. The publication is currently being updated.

¹⁰⁹ Yugoslavia, of course, is an OECD member.

cated destination. The end-use certificate, which also contains a clause on non-reexportation, is delivered by the government of the importing country, thus confirming it is the recipient. The Belgian diplomatic mission in the country concerned verifies the authenticity of the order and the competence of the person whose signature appears on the document. The end-use certificate is required for all transactions with governments of countries on a par with NATO members and all other non-NATO countries. Except for those situations in which an international import certificate is required, a copy of the contract may also be required. In reality, verification cannot be that thorough, especially as embassies and administrations lack sufficient personnel to check every delivery or because transactions usually take place in separate phases. Belgium usually trusts the political representatives of countries it officially recognizes, until suspicions of irregularities arise¹¹⁰.

As regards the passage of goods through Belgium, a distinction is made between the transit of military equipment for NATO allies over Belgian territory on the one hand and the commercial transactions involving the transit of strategic commodities for military use through Belgium on the other¹¹¹. The general context of the former form of passage is regulated by the Act of 11 April 1962 allowing NATO troops and their equipment onto Belgian territory. It has no bearing on the present discussion¹¹². The latter, however, was crucial to the Imhausen-Rabta affair. At that time, contrary to the traditional arms sales, Belgium required no authorization for transiting strategic chemicals. As such, it constituted a weak link in the chemicals export control network. Indeed, the original destination of chemical compounds from other NATO members or from countries with an equal status was easy to change in Belgium. A valid entry on transit documents, for example, was "Destination sea", a formula often used for crude oil or other commodities, expected to change ownership during the voyage.

It is obvious that the Belgian customs cannot check all shipments. The daily mass of exported or transited commodities is enormous. Some consignments bear false labels. The customs lack sufficient and specialized personnel to verify the genuineness of the entries on the documents. For chemicals, the need to make false declarations did not even arise. The same compound is often produced or commercialized under one of its many synonyms, that do not appear on the Australian

¹¹⁰ *De uitvoer en de doorvoer van wapens, munitie en militair materiaal*, 1988, p. 8.

¹¹¹ Testimony by Mrs Roland, Director-General of the Central Service for Contingents and Licenses. *Parlementaire Onderzoek*, 28 February 1989, p.75. Additional exceptions are arms exports to the BENELUX partners and to Belgian troops based abroad.

¹¹² That law, however, was at issue during the parliamentary debates on the US binary NATO force goal in 1986. For a detailed discussion, see J.P. Zanders, March 1989 and 1990.

Group's list¹¹³. The letter by the former Minister for Economic Affairs stating that T.D.G. is *tertiary diglycol* which does not appear on the export control list [see page 12], was illustrative for these complications.

The Central Service for Contingents and Licenses also suffers from being understaffed. Checks that shipments have indeed arrived at their declared destination are at best carried out at random. Normally, the exporter will present the signed customs forms of the importing country. However, in some Third World countries the required papers are virtually impossible to obtain. Moreover, as testified by the Director-General of the Central Service for Contingents and Licenses, submission of those documents by the expeditor is an administrative provision and not a legal requirement. Non-compliance cannot lead to prosecution¹¹⁴; the service can only file the case.

According to the Act of 11 September 1962, the Economic General Inspection (*Economische Algemene Inspectie*) is responsible for prosecuting import, export and transit violations. This implies checking the destination and the nature of the commodities with the information on the required documents. However, the service must turn to an examining magistrate or public prosecutor for e.g. seizures. In the event it takes criminal action against a firm, it proceeds judicially on behalf of the Procurator-General and not the Ministry for Economic Affairs, as it collaborates with the judicial authorities. However, the functionaries as such cannot act as an officer of the judicial police. In reality, the Economic General Inspection does not really occupy itself with controls on Belgian territory. The Parliamentary Investigative Committee noted that "*since its creation this Inspection service of the Ministry for Economic Affairs has hardly carried out any tasks with respect to controlling the arms trade*"¹¹⁵. Customs officers, on the other hand, perform on-site inspections. However, they lack sufficient means to execute these effectively. No more than 2% of all shipments are physically verified¹¹⁶. They are unable to take action against embargo infringements as such, because these do not constitute penal offenses in Belgium, unless another violation such as forgery has been committed.

¹¹³ The Ministerial Order of 20 June 1984 listing the first five chemicals, mentions a Belgian statistical number, but not, for example, the internationally accepted Chemical Abstracts Service registry number. This has been rectified by the new ministerial orders of 29 November 1989 by introducing the "Combined Nomenclature" code for the listed compounds.

¹¹⁴ Testimony by Mrs Roland, Director General of the Central Service for Contingents and Licenses. *Parlementair Onderzoek*, 28 February 1989, p. 86.

¹¹⁵ *Parlementair onderzoek*, 28 February 1989, p.560.

¹¹⁶ *Parlementair onderzoek*, 28 February 1989, p.561.

The complex administrative structure and the lack of trained personnel and resources seriously limit the chances of a violator being caught. Even if prosecuted, the possible sentences are unlikely to deter him. For instance, according to the present law, the Central Service for Contingents and Licenses must handle any regular application without taking into account any previous court convictions of the applicant. As a consequence, persons condemned for illegal arms trafficking or fraud at the customs cannot be refused a license¹¹⁷. The service's only sanction consists of nullifying the export license, provided the administration can prove conclusively that the expeditor has knowingly provided wrong or incomplete information. However, by the time the service learns of such fraud, the commodities have usually left the country. As a result, the purveyor can at most be persecuted for having exported commodities without an export licence.

This, however, is in breach of the General Act on Customs and Excises and not an economic criminal offence. The consequences are twofold. Firstly, the only body that according to the Act of 11 September 1962 and the Ministerial Order of 23 October 1962 can undertake legal steps is the General Economic Inspection. Above, we outlined that service's operational limitations. Secondly, sanctions must be taken by the Administration of Customs and Excises¹¹⁸:

1. in case of export or transit without a license or with a license obtained falsely or deceitfully:
 - confiscation and distraint on goods;
 - in case of illegal goods, a fine equal to twice their value;
 - a prison sentence between four months and a year, which may be doubled in case of recurrence.
2. in case the licenses have been used contrary to the conditions of use and validity:
 - distraint on goods;
 - a fine equal to the value of the goods.
3. in case of forgery, the Public Prosecutor is notified.

By contrast, had the violations been judged economic offenses, penalties would have included stiff fines and prison sentences up to five years, as well as professional sanctions such as temporary or definitive bans on exercising the profession or trade for which the offender has been condemned.

In case an exporter has given false information concerning the transaction, the *Nationale Delcrederedienst/Office Nationale du Ducroire*, a commodity export credit guarantee service, refuses to award damages in case the transaction turns out badly. Nevertheless, there exists a trend to insure risk-bearing orders with private companies, more so as these are prepared to cover those shipments that have been refused by the *Delcrederedienst*. The sanction is therefore not applicable in many cases.

¹¹⁷ *De uitvoer en de doorvoer van wapens, munitie en militair materiaal*, 1988, p.22.

¹¹⁸ *De uitvoer en de doorvoer van wapens, munitie en militair materiaal*, 1988, pp. 24-25; 56.

The Parliamentary Investigative Committee, which had been installed on 12 May 1987 and concluded its report on 28 February 1989, focused its inquest for the largest part on Belgium's role as direct arms supplier or transiting country for shipments to the belligerents in the Gulf War. In this context, a representative of Phillips Petroleum was interrogated on the sale of thiodiglycol to Iraq in 1983. The case study is of limited value, especially as no export controls were in force at that time [see pp. 11-12]. Mr Verding's claim that at that time the company was unaware of Baghdad's chemical warfare intentions remained virtually unchallenged. A governmental working group studying the parliamentary report, confirmed without any comment that the transaction was not illegal as the export of thiodiglycol had only been submitted to a license on 20 June 1984¹¹⁹. However, early in 1989, as the participation of Belgian shippers in the Imhausen-Rabta affair emerged, the Parliamentary Investigative Committee included three main policy recommendations in its final report to prevent future Belgian involvement in the spread of chemical weapons¹²⁰. Firstly, it urged the government to submit additional chemicals from the Australian Group's warning list to an export licence. At present, this list is only circulated to the chemical industry. Secondly, infringements of embargoes imposed by the Belgian authorities must be made punishable by law. Under current legislation a shipper cannot be persecuted unless he has committed an additional violation of common law, such as deceit. Finally, the Commission also stressed the need to control the export or transit of technology that could promote chemical weapons proliferation.

At the initiative of the Minister for Economic Affairs, a governmental working group was set up to study the Parliamentary Investigative Committee's report. It met four times between 23 March and 8 June 1989. Although it noted in its final report¹²¹ that most of the cases scrutinized involved the transit of arms shipments over Belgian territory, it accepted that new executive controls over arms sales were necessary. The working group nevertheless believed that the prevailing acts of 11 September 1962 and 19 July 1968 provided a sufficient legal base to control international trade in general. Their scope is comparable to that of similar laws in other countries. Therefore, it recommended that the government should enforce new controls over arms shipments and strategic chemicals by means of ministerial orders rather than a new law. With respect to the spread of chemical weapons in particular, the report advocated a total prohibition on producing, exporting and transiting chemical - and biological - weapons as general policy principle. On a more concrete level, the number of chemicals on the export control list should be increased and subdivided into three categories according to their military relevance. Finally, controls should to be imposed on the export and transit of technology. The

¹¹⁹ *Rapport du groupe de travail [...]*, 8 June 1989, p.2.

¹²⁰ J.P. Zanders, 7 February 1989.

¹²¹ *Rapport du groupe de travail [...]*, 8 June 1989.

representatives of the various ministries appreciated the different nature of controlling the spread of conventional arms and of chemical weapons. They also recognised the previous efforts by the Belgian authorities to prevent chemical warfare and valued their participation in discussions within the framework of BENELUX, the European Communities and the Australian Group.

Heeding the recommendations, the Minister for Economic Affairs Claes issued two new Ministerial Orders on 29 November 1989, which entered into force upon their publication in *Het Belgisch Staatsblad* on 20 December. The first order subjects the export of certain commodities to licensing requirements. It replaces both previous Ministerial Orders of 1984 and 1987. Its main novelty is the introduction of *Combined Nomenclature* (CN) codes, by which the goods are identified. The nine chemical compounds currently in the Australian Group's core export control list are included in the first of four annexed CN code lists:

Ex 28121010	phosphoryl chloride; phosphorus trichloride
Ex 28121090	thionyl chloride
Ex 29209090	trimethyl phosphite; dimethyl hydrogen phosphite
Ex 29309090	thiodiglycol
Ex 29310000	methylphosphonyl difluoride; methylphosphonyl dichloride; dimethyl methylphosphonate

In view of the trade agreements within the framework of the Belgian-Luxembourg Economic Union and the Benelux, no licenses are required for their export to Luxembourg or The Netherlands. As regards these chemicals, no other exceptions or additional provisions have been specified.

The second Ministerial Order subjects the transit of certain commodities to a licensing system. The regulations apply to all goods listed in the first Ministerial Order. Moreover, Article 1 also explicitly names the nine strategic chemicals together with their CN code. In certain precisely defined cases, no Belgian transit license is required for goods:

- coming from or having Luxembourg as final destination;
- having The Netherlands as final destination;
- coming from The Netherlands provided they are in free trade there;
- not being transshipped or transferred to another means of transport;
- coming from Australia, Belgium, Canada, Denmark, Federal Republic of Germany, France, Greece, Italy, Japan, Luxembourg, The Netherlands, Norway, Portugal, Spain, Turkey, the United Kingdom and the USA, if accompanied by a valid transit authorization by the authorities of one of these countries; and which have as destination: Albania, Bulgaria, Cuba, Czechoslovakia, German Democratic Republic, Hungary, Kampuchea, Laos, North Korea, People's Republic of China, People's Republic of Mongolia, Poland, Rumania, USSR and Viêt-Nam.

In all other cases the principles and procedures laid down in the Acts of 1962 and 1968 are applied.

Although regarding the international trade in chemicals both Ministerial Orders address the largest deficiencies of previous export controls, these measures still lack any deterrence value for com-

panies bent on breaking the law. Therefore, the Belgian Government intends to go beyond the recommendation made by the working group. A governmental committee consisting of ten ministers and top functionaries is currently working in all silence on a bill to regulate the sale of ordnance. The draft, of which the contents were leaked to the Flemish daily *De Standaard*¹²², "must include" a complete ban on "the export and transit of chemical weapons" in "the strictest sense of the term". A scientific committee will be established to advise the Government on the production and trade in chemical and biological weapons (Art. 2 of the bill). It will collect data on products which could be used for aims "forbidden by the Geneva Protocol". The Government will impose an absolute ban on the im- and export, as well as on the transit, of these products and will also outlaw the production of chemical and biological weapons.

Persons who trade in these products will be submitted to a stringent control regime. Licences and patents will only be granted after a thorough investigation. Permission for export or transit will be refused for "services and goods" as soon as there exists "an unlawful risk" that these could be used for chemical warfare. Shippers withholding or giving incorrect information will be liable to criminal prosecution. The newspaper expects that the government will soon decide on the final draft and submit it to parliament. The bill will supplement the prevailing acts of 1962 and 1968. Under it, the government will also be required to report every six months to parliament.

The present government thus appears to take the issue of chemical weapons seriously. Contrary to the working group's advice, the government opts for a bill, which will be submitted to parliament for approval. This points to a wish for a broad political consensus on the issue and for a firm legal base. Completely new is the inclusion of provisions on biological weapons. This will be the first time Belgium promulgates legislation as required by the 1972 Biological and Toxin Treaty.

However, the inclusion of provisions on chemical and biological warfare in a general bill on arms transfers will inevitably make them subject to political-linguistic tensions in Belgium. One may expect that the interests of the Walloon arms industry, represented by MPs in all Walloon political parties will be poised against the Flemish abhorrence against chemical warfare. *De Standaard* expressed some apprehensiveness concerning delaying tactics by the Walloon arms industry and even suggested that making the bill into law will to a large extent depend on the Flemish representatives.

¹²² PVDD, 29 December 1989 and 3 January 1990.

Imhausen Chemie - Cross Link Antwerp - Rabta: an overview.

The Imhausen case probably illustrates best how little the West European authorities were prepared to counter the spread of chemical weapons if a particular company purposely wished to avoid export controls¹²³. Until December 1988, the Federal Republic and Belgium had enacted more or less the same export regulations. Restrictions on the international trade of certain potential precursors for chemical weapons were promulgated by means of special orders in pursuance of general acts on foreign trade. Since 1984, Germany also requires a license for exporting technology and equipment with potential applications in a chemical weapons plant. Moreover, by implementing the 1954 Brussels Treaty, US, British and French experts each year certify that West Germany does not engage in chemical weapons production, thereby excluding any possible exportation of ready-made munitions. In general, the large chemical companies seem to apply the recommendations by the Australian Group.

The risk for wilful violations is much higher with smaller companies. German trade legislation contains a large gap, as exports procedures are largely simplified if a German firm owns subsidiaries abroad or if a foreign company has a branch in the Federal Republic. This was very apparent in the construction Imhausen Chemie had set up. Pen-Tsao-Materia-Medica-Center Ltd. occupied offices both in Hong Kong and in Hamburg. It was set up by Imhausen on 1 April 1987. In the Chinese port, Pen-Tsao shared office space with Dee Trading Co. Ltd., which possessed a 23% stake in Imhausen, making it the largest shareholder.

The factory at Rabta was built with the expertise and technology from companies all over the world. The Japanese Steel Works (Nihon Seijo) supplied lathes and air guns for an equipment factory and Toshiba an electrical power station in the belief the Libyans were constructing a desalination plant. VEB Stahlbau Plauen (GDR) furnished steel constructions. A computer was obtained from the Florida based Harris Company. Thyssen and Karl Kolb, two West German firms investigated for their part in Iraq's chemical warfare programme, also participated. Imhausen Chemie, however, played the

¹²³ This summary of events is compiled on the basis of press reports in Belgian, West German and American newspapers and magazines published during January and February 1989.

pivotal role for installing the actual production system. It placed important orders with other firms, that apparently were unaware of the final destination. Salzgitter Industriebau GmbH - a state-owned enterprise - initially denied having drawn up the plans for Rabta, but admitted to having delivered pipes and electrical equipment for a pharmaceutical production unit between 1984 and 1987. Imhausen had ordered the equipment for a subsidiary in Hong Kong. Later it emerged both companies had held several meetings, discussing the constructions in Libya. Teves GmbH, a subsidiary of the American multinational I.T.T. which had supplied cooling equipment, also claimed Hong Kong was the final destination.

In fact, Imhausen had set up a double project in Hong Kong and Rabta, which were both called Pharma 150. The German company actually built a factory on the Yeun Long Industrial Estate in Hong Kong, although it only served as a cover for other activities. An important indication that the Rabta plant may indeed be a chemical weapons production site followed from the declaration by the Frankfurt based company John Zink that it had exported an incinerator for superfluous gases ordered by Ishan Barbouti International Engineering to Hong Kong. Ishan Barbouti, who appeared to have close ties with Colonel Qadhafi, owned branches in most industrial countries, which often were nothing but letter box addresses. Between 1985 and 1987, Barbouti placed large orders with several German building companies, whose representatives were convinced these were intended for metal works. The materials were shipped to Rabta over Rotterdam. Some companies were not aware of the destination. Imhausen received its orders for Rabta from Barbouti. It is important to note that at the time the contracts were signed between Imhausen and I.B.I. Engineering in 1986, both companies were struggling to survive.

In February 1986, the Antwerp based trading company Cross Link is believed to have shipped both building materials and chemicals to Tripoli for Imhausen Chemie and I.B.I. International. However, before leaving Hamburg, the ship *Wilhelm Schulte* had given Hong Kong as her final destination. The owner of Cross Link, Jozef Gedopt, who was arrested on 11 January 1989, allegedly falsified the freight documents at Barbouti's request. The chemical compounds were actually loaded onto the *Wilhelm Schulte* in Antwerp. Gedopt is believed to have already been involved in consignments to Rabta in 1985. He also shipped goods through Zeebrugge, Rotterdam and Le Havre. Cross Link, and several of its small subsidiaries, had commercial contracts with three of the five German firms named by the USA. As Gedopt could not obtain the required export licenses, he collaborated with August Vleminckx, who organized the shipments via Sanexomar, without that company knowing it. Vleminckx was also temporarily arrested. Both Belgians were apprehended for fraud and forgery, but cannot be persecuted for their role in the shipments.

Appendix: List of chemicals.

(i) Core export control list

thiodiglycol
 phosphoryl chloride
 dimethyl methylphosphonate
 methylphosphonyl difluoride
 methylphosphonyl dichloride
 dimethyl hydrogen phosphite
 phosphorus trichloride
 trimethyl phosphite
 thionyl chloride

(ii) Warning list

N-methyl-3-piperinidol
 2-N,N-diisopropylaminoethyl chloride
 2-N, N-diisopropylaminoethyl mercaptan
 3-quinuclidinol
 potassium fluoride
 2-chloroethanol
 dimethylamine
 diethyl ethylphosphonate
 diethyl N,N-dimethylphosphoramidate
 diethyl hydrogen phosphite
 dimethylammonium chloride
 ethylphosphonous dichloride
 ethylphosphonyl dichloride
 ethylphosphonyl difluoride
 hydrogen fluoride
 methyl benzilate
 methylphosphonous dichloride
 2-N,N-diisopropylaminoethyl alcohol
 pinacolyl alcohol
 substance QL
 (= 2-N,N-diisopropylaminoethyl ethyl methylphosphonite)
 triethyl phosphite
 arsenic trichloride
 benzoic acid
 diethyl methylphosphonite
 dimethyl ethylphosphonate
 ethylphosphonous difluoride
 methylphosphonous difluoride
 3-quinuclidone
 phosphorous pentachloride
 pinacolone
 potassium cyanide
 ammonium bifluoride

potassium bifluoride
sodium bifluoride
sodium fluoride
sodium cyanide
tris-ethanolamine
phosphorous pentasulphide
di-isopropylamine
diethylaminoethanol
sodium sulphide

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