

GETTING Proposals for enhancing implementation **VERIFICATION** of the Chemical Weapons Convention RIGHT



The 1993 Chemical Weapons Convention (CWC), which bans the acquisition of chemical weapons, reaffirms the ban on their use and seeks the destruction of existing stocks, entered into force in 1997. The Organisation for the Prohibition of Chemical Weapons (OPCW), which was set up to help implement the treaty, has major achievements to its credit. But it has recently run into difficulties in fulfilling its mandate. For their part states parties have not always fulfilled their legal obligations to support and comply with the treaty.

In April–May 2003 the states parties to the treaty will hold their first Review Conference to examine implementation of the CWC to date. This report is intended to stimulate thinking among states parties and in the OPCW's Secretariat prior to and during that review process. It examines key areas of the OPCW's performance, as well as that of states parties

in supporting the convention, and makes recommendations for change and reform. The report is based on research for VERTIC by consultant Joan Link.

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Executive summary

- The parties to the 1993 Chemical Weapons Convention (CWC) have achieved a great deal since entry into force of the convention and establishment of the Organisation for the Prohibition of Chemical Weapons (OPCW). In recent years, however, the OPCW has suffered from misgovernance, mismanagement and financial shortfalls which must be corrected if the CWC is to achieve its objectives in the changed political and technological environment of the 21st century.
- Not only are existing chemical weapon stockpiles being destroyed at a much slower rate than required by the treaty, but verification has become skewed towards monitoring this process. This has been at the expense of verifying that illicit production of new chemical weapons is not occurring, including in the chemical industry. This imbalance needs to be addressed urgently. In addition, greater efficiency and innovation in verification is necessary if the financial costs are not to become unsustainable. States parties also need to begin to consider how compliance with the CWC might be more holistically assessed.
- Governance and management of the OPCW also need attention. Faster, better informed decision-making is needed, along with the more active engagement of all states parties. The Secretariat needs to improve its strategic planning so that its activities better match the objectives of the convention. States parties should take a more active role in such planning and seek common understandings with the Secretariat on the organisation's priorities.
- Urgent steps are needed to improve the OPCW's staffing situation, including staff morale. Possible reforms include a more flexible remuneration system to enable the organisation to attract the necessary skilled staff and the scrapping of the rigid fixed tenure policy. Accreditation of the Secretariat to an international 'people quality' standard would improve management style and internal communications.
- Measures currently being considered to improve the financial management of the OPCW should be implemented urgently. At the same time a review should be undertaken to consider more radical reforms, including a solution to the problems caused by the 'possessor pays' principle.
- The OPCW should also seek to become more open and transparent, while maintaining confidentiality where strictly necessary to protect state security and commercial proprietary information. More OPCW meetings should be open to the public, consultative status should be granted to appropriate non-governmental organisations and information on the operations of the organisation should be made more widely available.

Introduction

The first Review Conference for the 1993 Chemical Weapons Convention (CWC) will take place in April–May 2003, six years after the treaty's entry into force in April 1997. Although the states parties and the Technical Secretariat, together making up the Organisation for the Prohibition of Chemical Weapons (OPCW), have achieved much, they have not realised all of the objectives established by the treaty for the first five years of its life. In the past two years managerial and financial difficulties have become increasingly apparent, culminating in the controversial dismissal, on the initiative of the United States, of the first Director-General, José Bustani of Brazil, in April 2002. He was replaced in July 2002 by Rogelio Pfirter of Argentina.

Although some of the organisation's failings can be attributed to its leadership, the treaty's governing bodies—the Executive Council and the Conference of States Parties (CSP)—and the states parties individually must also share responsibility. The greatest challenge facing the Review Conference will be to ensure that the treaty is put back on course towards full implementation.

The aim of this report is to examine the following key aspects of the CWC's implementation since entry into force:

- the performance of the verification regime;
- the management of the OPCW, particularly its financial management; and
- confidentiality and transparency.

The report makes recommendations for consideration at the 2003 Review Conference as well proposing reforms that could be implemented by the new Director-General and/or the Executive Council prior to the Review Conference.

The verification regime

The CWC is arguably the most complex multilateral disarmament convention ever agreed. It seeks both the destruction of all existing stocks of chemical weapons (CW), a weapon of mass destruction that has long been feared, and the prevention of CW armament or rearmament by any state in the future. Its ambitious verification regime, set out in several key articles of the convention and on 209 pages of its Verification Annex, places significant requirements on states parties as well as on a large, well-established but ever-changing global chemical industry. The convention also establishes a permanent multilateral verification organisation, located in The Hague, to help verify compliance.

The intention of the verification system is to provide assurances to states parties that existing stocks of CW are identified and destroyed, and that there is no illicit CW production under the guise of chemical production for peaceful purposes. On-site inspections play a significant role in achieving both goals. Measures which restrict the transfer of certain chemicals, together with the establishment of national authorities and the adoption of national implementation legislation, including the possibility of criminal penalties, are intended to enhance implementation.

Given the novelty and complexity of the convention's verification goals, it is not surprising that there have been teething problems and that implementation has had to confront some harsh realities. One

is the inherent difficulty of establishing, from scratch, an unprecedented verification organisation for a type of weapon that was previously largely unregulated by international law. A second has been the differing and evolving views of states parties on priorities for the OPCW. A third reality has been the inability or unwillingness of states parties to carry out in full their obligations under the convention in terms of declaring and destroying their chemical weapons, declaring and co-operating in the monitoring of their peaceful chemical industry, and providing unstinting political, technical and financial support to the OPCW.

Finally, there have been major changes in the way the global chemical industry is organised since the convention was negotiated. While many large-scale single-product facilities remain in developed countries, many have moved to developing countries where costs are cheaper. At the same time there has been a trend in the industrialised countries towards smaller facilities that are able to switch production between different products at short notice to meet the demands of more complex markets. Such flexible facilities also, unfortunately, make it easier to switch to the production of CW or CW precursors.

The verification balance askew

One casualty of these realities has been the balance struck in the convention between the resources and effort devoted to verifying the declaration and destruction of existing CW stockpiles, and those devoted to verifying that new CW and CW capabilities do not emerge.

The convention provides for verification of (a) the CW possessor states' declarations of their CW stockpiles, (b) the transport where necessary of such stockpiles to secured sites, and (c) the retention of the stockpiles at those sites until they are destroyed. It also provides for continuous monitoring of the destruction process to ensure that no CW are retained or diverted (although there is no definition in the convention of what is meant by 'continuous monitoring', states parties have agreed that it means the continuous presence of inspectors and monitoring by on-site instruments). These provisions come into force immediately a state party declares any CW and continue until the weapons are completely destroyed. Destruction of all declared CW stocks was to begin two years after entry into force and be concluded 10 years after entry into force—by the end of April 2007.

At the same time, it was intended that industry inspections would commence as soon as state party declarations of relevant production of chemicals listed in Schedules 1, 2 and 3 of the CWC Annex on Chemicals had been made. In addition, inspections of facilities producing discrete organic chemicals (DOCs)—organic chemicals not listed in the Schedules to the convention—were set to start in 2000, at the beginning of the fourth year after entry into force. By this stage the industry inspection regime would be expanding as the destruction programme was reaching the halfway mark. The industry inspection system would continue in perpetuity. There is no implication in the CWC that at any stage industry verification should be a secondary activity to CW destruction verification.

Contrary to this vision, in the first five years of the convention, verification activity has concentrated largely on existing CW stocks, former CW production facilities and CW destruction plants, while industry inspections have been relatively neglected.

By July 2002, 185 CW sites had been declared and 758 inspections had taken place, including at sites of CW stockpiles, CW production facilities, CW destruction facilities, and what the convention refers to

as ‘old and abandoned’ CW. (These numbers count the rotation of staff at a CW destruction site as an inspection and include single visits to each site, but are an indication of the level of resources devoted to this activity.) The total expenditure by the OPCW on this activity over the five years since the CWC entered into force was approximately 80 percent of its total verification spending and about 40 percent of its total budget. (In 2001, however, financial cutbacks meant that the proportion of the verification budget spent on such activity rose to 85 percent.)

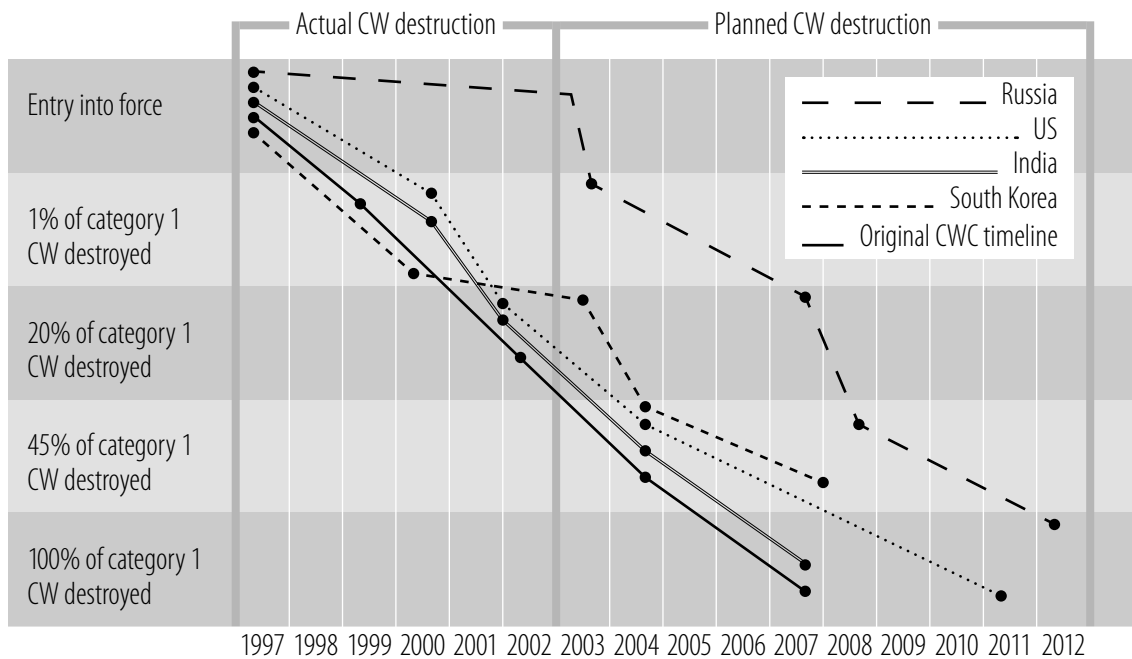
On the industry inspection side, by July 2002, 4,881 sites had been declared and just 452 inspections conducted. These included inspections at facilities producing chemicals listed in the three Schedules to the convention and at ‘other chemical facilities’ as specified in Part IX of the Verification Annex. (Some Schedule 1 and 2 facilities have been inspected twice, leaving the number uninspected higher than these figures imply.) The inspections have taken place on the territories of 51 states parties. It is a considerable achievement that inspections have been held in all the states parties with the most significant chemical industries—the US, Japan, Germany, UK, Switzerland, Italy, France, China and India—and on a smaller scale in a cross-section of other countries.

Nonetheless, the extent of industry verification at this stage of the treaty’s life is much less than anticipated. It is striking how small a proportion of sites declared under Schedules 1, 2 and 3 have been inspected so far, even taking into account the later start of DOC inspections in 2000. This is particularly so considering the proportion of declared CW sites already inspected. On present plans, by the end of 2002 there will have been 130 fewer industry inspections than the 590 planned—a reduction of almost a quarter. There was a marked decline, because of the OPCW’s poor financial situation, in the number conducted in 2001, and 2002 will follow suit (there were 75 inspections in 2001, compared with plans for 132; and in 2002 the probable total will be 61, compared with plans for 132). In 2001 and 2002 only 20 and 15 percent, respectively, of the verification budget will have been spent on industry verification, amounting to 10 and 7 percent, respectively, of the overall OPCW budget.

Destruction significantly delayed

The optimistic timetable for the destruction of declared chemical weapon stockpiles has not been met. During the negotiations it was generally assumed that only two major CW possessor states, the US and Russia, would immediately become parties to the convention and declare significant holdings of CW. At entry into force, however, India and ‘another state party’ (widely known to be South Korea) also declared CW stocks. In addition, to date 11 states have declared a total of 61 former CW production facilities. In total, 70,000 tonnes of CW have so far been declared, contained in 8.6 million munitions and containers, together with an additional 412,604 unfilled munitions and containers.

However, even though the size of the CW problem was underestimated, this has not been the cause of the delay in destruction, as the Indian and South Korean stockpiles are relatively modest. The real difficulty has been in determining effective destruction methods, building and commissioning destruction plants, and completing effective, reliable and safe destruction ‘campaigns’ at the plants which have commenced destruction. Problems have included stringent environmental licensing requirements and funding shortfalls. Even though the negotiators recognised the possibility of delay, particularly in Russia, and provided for the destruction deadlines to be extended if necessary, even the new schedules are likely to be breached.



Projected category 1 CW destruction programmes

Russia is in the worst situation of all the CW possessor states: it has barely begun to destroy its enormous stockpiles. On the basis of the revised draft plan it submitted to the OPCW in November 2001, it will be 2012 before its destruction programme is completed. There must be doubt about whether Russia can even meet this timetable, given that as of mid-2002 it was still unable to start destruction of its most dangerous category of CW. It has been given assistance by several Western countries, including the US, and the Russian government says that from 2002 funding for its programme is being increased six-fold. However, the programme needs greater political support at the highest levels of the Russian government if compliance is to be ensured.

The US has said that it, too, may need an extension of the deadline from 2007 to 2011, but will notify the OPCW more definitively in 2006.

Delayed approval of destruction plans leads to unnecessarily intensive verification

The OPCW, for its part, has been slow in approving CW destruction plans submitted to it by states parties. In some cases the plans have needed more work, in collaboration with the Secretariat, before being ready for Executive Council approval. In other cases, states parties have sought to negotiate changes to plans put forward by others: for example, the US has wanted modifications to Russian plans. Papers have not always been issued to Council members early enough to allow them to be adequately considered before Council sessions. In addition, the Secretariat has not always given the Council appropriate or timely advice on the substance of the items to enable decisions to be taken at the first available session. These problems have resulted in decisions being frequently deferred.

For example, Russia's plans for destroying its Category 2 CW (those derived from chemicals in Schedule 2 to the convention) at the Shchuch'ye destruction facility were presented to the Executive Council in July 2000, but as of July 2002 have still not been approved. The fact that the plans were considered defective by several Western states does not excuse the Council's inaction.

One result has been that verification of CW destruction has been over-intensive. Pending the approval of verification plans, the Secretariat has been forced to resort to continuous on-site monitoring of destruction plants by inspectors in order to fulfil the convention's requirements. This has been more labour-intensive, and therefore more expensive, than planned verification, which would allow regular but shorter visits at certain critical points and avoid wasting inspectors' time when destruction facilities are not operating because of routine maintenance or repairs.

Apart from the unexpectedly prolonged attention given to verifying the declaration and destruction of CW, there are other reasons why industry verification has progressed relatively slowly.

Late industry declarations

The industry inspection regime was hindered in its early days by late initial declarations by states parties of facilities involved with chemicals listed in Schedules 1, 2 and 3. The delay seems to have stemmed mainly from the lack of national implementing legislation requiring chemical companies to submit the data required and the difficulties that states parties had in compiling the data. Data were not necessarily held in the form required for the CWC, and considerable effort was often required by still embryonic national authorities to produce what was required. All this was more problematic than envisaged by the treaty negotiators.

In the first nine months after entry into force, 70 percent of states parties submitted the relevant initial declarations, but the remaining 30 percent drifted in over a further three-and-a-half years. Among those submitted late was the very significant US declarations, which were held up by the slowness of the US ratification process, including the late approval of US national implementation legislation. A further complication was the size and complexity of the US industry and the co-ordination required in a federal system. The US declarations were not submitted until April–June 2000, some three years late.

Even when declarations were made, the data were not always completely accurate or comprehensive, and this is likely to persist for some time—indeed, it is possible that declarations will never be completely accurate. That should not be seen as a failing of the treaty regime or of particular states parties, but rather a fact of life. Inaccuracy does not in itself undermine the convention, provided it does not mask substantive non-compliance and provided states parties are willing to improve data quality and respond to queries from other states or the Secretariat. States parties' national authorities and the Secretariat have been co-operating quietly in the past two or three years in an effort to improve state party declarations.

The delayed US declarations restricted the number of industrial facilities available for inspection in the first two years of the convention's life. The Secretariat had no choice but to concentrate on states which had already submitted their declarations, resulting in increased inspections of chemical facilities in Japan and Western Europe. There was considerable resentment among some of these states, and some threatened to suspend industrial inspections on their territory until the US complied with its declaration requirements.

Financial cutbacks targeted at industry verification

Planned inspections of industry in the years 2000–2002 have also been significantly reduced as a result of the serious financial pressure under which the OPCW has been operating during that period. Given the essential role that industry inspections play in implementing the convention, it seems short-sighted to target its economies at this activity.

The cutbacks in funding for industry inspections may in part reflect the disconnect between the OPCW's strategic priorities and its budgetary process. The number of inspections budgeted for, which has remained the same (132) for some years, was apparently arrived at simply by reproducing the previous year's plan, without considering actual verification requirements.

The Secretariat argues that the OPCW's fixed costs, for staff and other contracts, are so high that it has little room for manoeuvre in cutting costs. While this may be true, the Secretariat may also have misjudged the way in which it presented the options for making cutbacks to member states in 2000. It may have calculated that, if states parties believed that the only option for cutting the budget was to reduce numbers of inspections, they would provide additional funding rather than see such activity curtailed. The Secretariat has certainly taken this approach in 2002, telling states parties that it has deliberately 'front-loaded' industrial inspections early in the financial year, in the hope that when funds are expended at least some of them will make voluntary contributions to enable the remainder of the programme to be carried out.

Declining political support for industry verification?

Although in sessions of the Executive Council in 2001 and 2002 a small number of states parties, including Australia and South Korea, argued that budget savings should be found elsewhere than in industry verification, this was not widely supported. It is difficult therefore to avoid the impression that at least some states parties are less enthusiastic about industry inspections than they were when the treaty was being negotiated.

There are certainly some, including Western states, which take the view that, as a matter of principle, industry inspections should not begin seriously until all CW have been destroyed. Among states with the biggest chemical industries there is perhaps a reluctance to see repeated or more intrusive inspections at facilities which earlier inspections have indicated pose little risk to the convention, particularly while other states continue to hold stocks of CW. It is not clear whether this concern is always shared by the chemical industries in those states or whether it is rather a political judgement by governments. Other states parties feel that their chemical industries are so small that they should not be inspected at all.

Another group of states parties now find the DOC inspection regime unpalatable. Developing countries, which have traditionally seen the target of verification as being the industrialised countries with large chemical industries, now fear that if they have a reasonably developed chemical industry centred on DOC facilities, it will need to be extensively inspected. They are particularly concerned that they should not, as they perceive it, be imposed on by the developed world and big business. They are also suspicious that a shift of inspections towards DOCs will enable the developed world to minimise its own obligations.

DOC facilities are more susceptible to being clandestinely misused for CW production than larger but more inflexible facilities because of their ability to switch production to CW purposes. In addition, the

production of large quantities of a medium-risk chemical at a factory probably poses a greater threat to the convention's purposes than the production of small quantities of a high-risk chemical at a laboratory. Moreover, there are more declared DOC facilities than facilities producing Schedule 1 and 2 chemicals combined—as of June 2002, 3,975 DOCs had been declared, compared to 636 Schedule 1 and 2 facilities. In general, the risks of illicit activity are also greater in countries where the regulation of the chemical industry and commercial practices, including health, safety and environmental protection, is not as well developed.

The arguments against increasing the number of DOC inspections seem to be based on United Nations (UN)-style political considerations and concerns about additional costs to governments for national support to inspections rather than on a careful assessment of where the real risk of a breakout from the convention lies. The convention in any case provides for remedies against a bias in the distribution of inspections because it requires that equitable geographical distribution should be a factor in the selection of sites of all kinds of inspections. It also sets limits on the overall number of sites that can be inspected in each country in any one year, and permits states parties to propose where DOC inspections should take place.

Re-balancing the verification effort

It is likely that in the next 5–10 years the destruction phase of the CWC's work will be over, at least as far as the current CW possessor states parties are concerned. Barring the revelation by an existing or new state party that it has substantial CW stocks, the OPCW will need to shift its focus to the prevention of the diversion of chemicals and chemical production facilities to weapons purposes.

It is important to start to expand the CWC's industrial inspection capacity and programme now, rather than wait for the completion of verified stockpile destruction, for two reasons. First, the longer a regular pattern of inspections of industry is postponed, the more difficult it will be to establish one, as some states parties may begin to feel that the CWC is not really aimed at them and so justify to themselves a failure to participate fully in its provisions. Second, there is a need to take account of the relative risk to the aims and purposes of the CWC posed by different chemicals and facilities, such as DOC facilities.

A management mechanism may also be useful in ensuring that adequate attention is paid to industrial inspections in future. In 2000, the ratio of funding of CW-related to industry inspections was 80:20. In 2001 it was 85:15. States parties could set a slightly more ambitious target of a 75:25 for the next three years, shifting the emphasis further at the 2006 CSP, depending on progress in destruction. Such a mechanism would force states parties and the Secretariat to focus on the convention's strategic objectives, encourage moves to make verification of destruction more effective and efficient, and focus the attention of the Secretariat on achieving efficiencies elsewhere.

There are indications that states parties have accepted the need for an increase in the OPCW budget to permit more verification activity as CW destruction activity gathers pace. It is, however, unlikely that they will be willing to provide sufficient funds to allow inspection of CW destruction at the same level of intensity as hitherto, because the costs would be prohibitive. At present the OPCW has 181 inspectors for all verification activities. Figures provided by the Acting Director-General to the Executive Council in June 2002 indicate that at least 300 inspectors would be required to monitor just CW destruction

programmes at the same level of intensity as today. Without a large budget increase, industry inspections will continue to suffer, rather than show the required steady increase. The OPCW will therefore need to seriously consider more cost-effective means of verifying destruction.

Remote and instrument monitoring

The Secretariat has already experimented with installing instruments such as flowmeters at key stages of the destruction process, and has been exploring the use of closed-circuit television (CCTV) for transmitting continuous real-time images back to OPCW headquarters. Flowmeters have been used successfully in India and could be extended to new destruction facilities as they are built. Although they are expensive, these devices could reduce the number of inspectors needed for permanent monitoring. This would be in the best tradition of ‘spend to save’.

It would be necessary to develop safeguards to ensure that all states parties were satisfied of the authenticity of the data obtained by CCTV. The OPCW could gain from co-operation with the International Atomic Energy Agency (IAEA), which has used remote monitoring equipment for several years. It is unlikely, however, that remote and instrument monitoring devices could be used at operational destruction facilities, given the complexities of retrofitting them and the possible need for facility re-licensing.

Simplification of inspection procedures

The simplification of existing verification procedures may also reduce costs. It may be possible, for example, to reduce the monitoring of intermediate steps in the destruction process by improved verification of the quantities of CW entering a destruction facility and the bi-products which exit it. The portal monitoring systems used in verifying the US–Soviet 1991 Strategic Arms Reduction Treaty (START I) and the 1987 Intermediate-range Nuclear Forces (INF) Treaty offer precedents.

Other verification issues

Other aspects of verification which have also been neglected to date—sampling, challenge inspections and national compliance assessment—also deserve greater attention if the full potential of the CWC is to be realised.

Sample analysis

Although it was envisaged in the convention as an important technique, the taking of samples (for analysis on-site or at an OPCW-certified laboratory) has only been done once in an actual inspection, in the UK, and even then only at the state party’s urging.

Two deterrents to the use of sampling are its cost and logistical difficulty. The problem is also partly political. The US Senate, as part of its advice and its consent to ratification of the CWC, imposed a condition that prohibits samples taken during inspections in the US to be removed from US territory. In spite of US efforts to avoid such a condition appearing to be a reservation, the effect is arguably the same. It sets a bad precedent which the US and many other states parties would not like to see emulated.

Other states besides the US have already proved reluctant to see sampling carried out during routine on-site inspections (OSIs).

Despite these obstacles, sampling remains a potentially useful tool for clarifying doubts about the results of industry inspections, particularly at sites with which inspectors are not familiar. It needs to be available at every level of on-site verification, including for selective use at DOC sites. It would also be crucial in the event of a challenge inspection. Inspectors need therefore to be familiar with the techniques required to use sampling in the field. Regular use of sampling at, for example, Schedule 2 sites, will increase its familiarity and should lessen some of the political objections to its use which might otherwise arise during DOC or challenge inspections.

Chemical industry representatives in the states parties of the OPCW's Western European and Others Group sometimes seem more relaxed about this issue than their governments. This is one of a number of areas where a closer dialogue with industry, both at the national level and at the OPCW, would be beneficial.

Challenge inspection: practices, if not for real

The CWC provision that permits a state party to request a challenge inspection on the territory of another has not yet been used. Although there have been private and public allegations about non-compliance by certain states parties, there has been a preference for addressing them through bilateral discussions or leaving them unresolved. It is perhaps feared that a refusal by a state party to accept a challenge inspection, or an ambiguous outcome of an inspection, would weaken rather than reinforce the convention. There may also be doubts about whether the OPCW is politically, managerially and technically mature enough to mount such an inspection. A botched challenge inspection would have significant adverse consequences both for the convention and for arms control and disarmament efforts more broadly.

The challenge inspection procedures have at least been practised by means of mock inspections. Brazil, the UK and the US have each conducted a practice challenge inspection with the participation of OPCW inspectors. The UK has also involved OPCW inspectors in five of its own national practice challenge inspections. This has allowed the bureaucratic and technical procedures agreed in the convention and refined by the Preparatory Commission to be tested and adjusted.

It is important to find ways of preventing the challenge inspection mechanism from atrophying through lack of use or because unfamiliarity results in undue fear of its use. Further practice challenge inspections seem the best way to do this, especially in the regions which have not so far conducted them. The Asian Group, Eastern Group and African Group could each be asked to agree on a small number of candidate countries which would be willing to undergo a practice inspection, at a time selected by the Secretariat at one of a number of named facilities. Such a programme would not preclude other states hosting further practice challenge inspections, nor would it prevent a state party from inviting the OPCW to conduct an inspection to clarify doubts raised by others about its compliance. The latter would be a particularly welcome type of confidence-building measure.

A comprehensive assessment of state party compliance

Since 1999 the Secretariat has provided a six-monthly Verification Implementation Report (VIR) to the Executive Council. This analyses the implementation of the inspection regime, drawing from the sum of the inspection reports any lessons that might be learned about the functioning of the regime, and presumably proposing adjustments that might be required. (The description of this document is necessarily imprecise since it is not publicly available.)

Distribution of inspections of Schedule 1,2 and 3 facilities among states parties

State party	Schedule 1	Schedule 2	Schedule 3	DOC	Total
Australia				1	1
Belgium				1	1
Brazil			1		1
Canada	1			1	2
Chile			1		1
China	2	4	1		7
Czech Republic				1	1
Federal Republic of Yugoslavia	1				1
Finland	1			1	2
France	1	2			3
Germany		5			5
India	1				1
Iran	1				1
Ireland				1	1
Italy		2			2
Japan	1	2			3
Mexico			1		1
Netherlands			1		1
Norway	1			1	2
Poland				1	1
Russian Federation				1	1
Saudi Arabia				2	2
Singapore	1		1		2
Slovak Republic				1	1
South Africa	1			1	2
Spain	1		1		2
Sweden	1				1
Switzerland		2	1		3
Turkey				2	2
Ukraine				1	1
United Kingdom	2	2	1		5
United States	1	9		1	11
Uzbekistan			1		1

Derived from Annex 8 of draft OPCW Annual Report for 2001, July 2002

Total 72

The focus of the VIRs is, however, on the performance of the verification system itself, not on the compliance of individual states parties. This needs to be rectified if confidence in the implementation of the treaty is to grow. A useful model might be the IAEA, which is developing the tools to permit it to undertake a comprehensive evaluation of each state's compliance with its nuclear safeguards agreement, using all available information. This new regime uses extra data provided by states themselves under additional protocols to their safeguards agreement, in addition to information from other states parties, commercial companies and open sources such as the media and non-governmental organisations (NGOs). It even includes information from commercially available satellite imagery.

Recommendations

The 2003 CWC Review Conference should carefully assess the implications of the delay in CW destruction schedules for the implementation of other aspects of the verification regime. It should also consider how to ensure that the OPCW focuses on its core verification outputs and becomes more efficient in using its scarce resources. In addition the Conference should consider how best to ensure that the industry inspection regime can be developed given the likely financial constraints. One option would be to plan a gradual shift of resources away from CW destruction activity to industry inspections.

Specifically, states parties should also consider the following suggestions:

- to enhance the industry inspection regime, states parties should endorse the proposals for changes in the targeting of industry inspections proposed in the draft 2003 budget;
- between the First and Second Review Conference there should be at least one inspection of at least one facility in every state party that has made a declaration under Schedule 1, 2 or 3 of the convention or under the provisions relating to other chemical production facilities;
- to increase the pace of DOC facility inspections, states parties with such facilities on their territory should invite the OPCW to conduct such inspections, both to demonstrate that they are fully complying with the convention and to counter the impression that the CWC is primarily targeted at the large chemical-producing countries;
- to boost the viability of challenge inspection, funds should be provided for one practice challenge inspection over the next three years in each of the regions that has not yet experienced one;
- states parties should decide how to reduce the costs of CW destruction inspections, both to permit more verification activity as the Russian programme for Category 1 CW gathers pace and more US destruction facilities come into use, and to enable industry inspections to be increased. One way would be to simplify the procedures for inspections, target verification at strategic points, and make increased use of remote and instrument monitoring systems;
- states parties should decide that the taking of samples during industry inspections should become more frequent. To allay apparently genuine concerns about the practicality of conducting sample analysis in the field, the OPCW's Scientific Advisory Board should undertake a thorough study of the question;
- states parties should debate how they wish to develop the capacity of the OPCW to assess compliance, what degree of reassurance they want to have about the behaviour of other states parties, and what gaps there are in the present compliance assessment system;
- the Executive Council should commission a study analysing how compliance assessment might be broadened and improved, including whether the IAEA's new procedures might be emulated. The Review

Conference could authorise the Secretariat to begin using open-source data to help it clarify compliance ambiguities.

Governance, management and finance

Governance

Over the past three years, the decision-making processes of the OPCW have slowed, with the Executive Council often deferring difficult decisions, sometimes for long periods. For example, at its first session in 2001, the Council declined to take decisions on:

- the Russian destruction plan for Category 2 CW at the Shchuch'ye destruction plant, which had been put before it in June 2000;
- plans for the conversion of CW production facilities at Volgograd;
- the plan to convert a CW production facility at Novocheboksark;
- key issues relating to cash-flow and other budgetary problems; and
- the use of official languages.

The Conference of States Parties has suffered from similar indecisiveness. After its May 2001 session, the Harvard–Sussex Program (HSP) reported that: ‘With the exception of the 2002 budget, [the CSP took] few substantive decisions... due to an increasing paralysis in the policy making organs of the Organisation’.

There seem to be several reasons for this creeping paralysis. One is a lack of political will on the part of states parties. While there seems to be no overt hostility to the convention, it is clearly not a high enough priority in the foreign and defence policies of many states. The siting of the OPCW in The Hague means that delegations are usually small, lacking in experience of multilateral conventions and pre-occupied with their country's bilateral relationship with the Netherlands. In the capitals of states parties with virtually no chemical industry, there is naturally less interest in a convention that appears not to affect them materially.

There have also been flaws in the way in which the OPCW's decision-making process has been organised. The Chair of the Executive Council tends to allow long agendas that include many items that are not ripe for decision. Documents have often been late in arriving for Council sessions, giving delegates little time to consider them or seek instructions. This seems to stem at least in part from insufficient Secretariat staffing for editing and producing documents in the official languages.

National documents have similarly been late in arriving and sometimes not sufficiently well prepared to enable a rapid decision by the Council. Despite intersessional consultations, the preparation of items for decision seems to be less efficient than in similar regimes, perhaps because the Chair and Vice-Chair, under the pressures of other duties, seem to leave much of the work to a small number of active delegations.

The OPCW's regional groups (which are similar to those elsewhere in the UN system) are not all sufficiently active in co-ordinating views and preparing decisions. It may be that the group structure, specified in the convention according to Cold War custom, is no longer appropriate.

Finally, an unhealthy culture of blame and suspicion has developed between delegates and staff of the Secretariat, perhaps as a result of the financial crisis, which exacerbates the situation.

Ideas for improving the functioning of the OPCW are set out in the recommendations below. States parties and the Secretariat may find it helpful in considering these to examine the operations of other organisations, such as the IAEA and the provisional Comprehensive Test Ban Treaty Organisation (CTBTO), to see whether they might be emulated. For example, the Chair of the IAEA Board of Governors holds an intensive round of bilateral consultations with members before each session to prepare decisions or commission further work needed to reach a decision.

Management

Several important decisions need to be made about the management of the OPCW Secretariat in the early days of the new Director-General's incumbency. Others may require decisions by the 2003 Review Conference.

One key issue is the mismatch between the organisation's strategic priorities and the allocation of staff. Paradoxically, in spite of the importance of verification, resolving this issue might involve reducing the number of inspectors. In the past two years many inspectors have been occupied no more than 40 percent of the time, in part because of the financial cutbacks that have reduced inspection activity. The number of inspectors (or any other category of staff) should not be permanently fixed or politically determined, but be based on the requirements of the OPCW's Medium-Term Plan. Tasks which will become more important in the future, such as assessment of compliance, will need to be reflected in the plan.

Because it uses the UN remuneration system, the OPCW has not been able to use financial incentives successfully employed elsewhere to improve staff morale and retention rates. Possibilities include higher salaries for staff with skills in short supply, such as senior finance and technical personnel, and bonus schemes to reward good performance.

In seeking efficiencies, it is also often useful for an organisation to vary the level and mix of staff as managers see fit. At the moment, the Secretariat is required to base its budget calculations on fixed staffing levels determined by the CSP. Any reforms would however need to be carefully implemented to protect staff employment rights and conform to International Labour Organisation (ILO) requirements and rulings.

The Secretariat is also inhibited by the rule that senior staff (P Grade and above) should be restricted to a single seven-year appointment. While this policy was intended to strengthen the organisation by ensuring a regular influx of new thinking and experience, and to avoid the nationals of one state party monopolising a senior position, it has on balance been disadvantageous. Although its impact has not yet been fully felt, if it is strictly implemented from now on the organisation will lose all its most experienced staff within the next two years (assuming that the seven-year period is counted from entry into force). The rule acts as a disincentive to staff to stay for the full seven years of their contract because it precludes them from pursuing a long-term career at the OPCW. It also acts as a hindrance to the recruitment of mid-career personnel from industry. Finally, the rule militates against effective staff management, counselling, training and promotion because it ensures automatic severance at the end

of seven years. Most organisations use a mix of contracts of different lengths set on the basis of business need. Combined with a proper staff assessment, counselling, training and promotion system, contracts are then renewed if performance is acceptable. The OPCW needs, in any event, to be much more rigorous in using its systems for managing poorly performing staff, ensuring that if they do not improve they are sacked or do not have their contract renewed.

If the current loss of staff is to be stemmed, the new Director-General must urgently deal with the poor morale of the Secretariat resulting from his predecessor's management style and manner of departure. Channels of communication with staff have become blocked, the culture is closed and unsupportive, and the recommendations of a 1999 internal management review have been largely ignored. In these situations, some organisations have found it helpful to seek accreditation to a recognised 'People Quality Standard', such as Investors in People (iip), which is widely used in the UK and available in the Netherlands through an iip subsidiary. Organisations have often found that simply preparing for certification to such a standard has resulted in major improvements to line management, internal communications and staff morale.

Finance

In 2000–2001 the OPCW faced a financial crisis which had been brewing since entry into force. This section of the report analyses the financial history of the organisation and suggests ideas to avoid a recurrence of the crisis.

For the first three years of its life, the OPCW had budget surpluses (€16.4 million, €8.45 million and €3.7 million in 1997, 1998 and 1999, respectively), requiring the repayment of dues to states parties. (Like those of other parts of the UN system, OPCW regulations require surpluses to be returned to states parties once all the year's bills have been paid and the accounts audited.) This happened because activity levels, particularly those related to verification, were lower than anticipated and because of poor budgetary calculations, such as the use of assumed rather than real costs for staff pay increases.

In 2000 and 2001 states parties held the OPCW budget to zero nominal growth (allowance was not even made for inflation) and in 2002 to zero real growth (an increase was made to cover expected inflation). This was perhaps an understandable reaction to budget surpluses and suspected poor financial management. But states parties did not appear to be basing their estimates on the true activity levels that the OPCW would be undertaking as implementation of the convention gathered pace. Nor did they take a realistic view of the likely income from CW possessor states.

The situation was made worse by poor financial governance and management. Many states parties, even those on the Council, exhibited a complete lack of interest in budget matters. Those which were interested often had a short-term approach to the OPCW's finances. There was also no common view between the then Director-General and states parties on how the spending of funds should relate to the organisation's strategic priorities. On the Secretariat's part there was inadequate monitoring of expenditure and no monitoring of income. At one point finance staff appear not to have realised that a proportion of the funds that appeared to be available was committed to be returned to states parties. A high turnover of senior finance and administration staff contributed to the situation. The result of these problems was a budget deficit in 2000 of €5 million.

The position was exacerbated by a problem peculiar to the CWC. The OPCW has two sources of income—the normal dues of states parties assessed according to the UN scale of assessments, and ‘possessor pays’ funding whereby those countries which declare the possession of chemical weapons pay for the OPCW to verify their destruction. The CW possessors are not obliged to provide these additional contributions in advance, but only after the OPCW has begun to incur costs, and then only after presentation of an OPCW account. This results in significant delay between the OPCW incurring costs, such as for staff salaries and equipment, and reimbursement. Even after invoicing, possessor states do not pay promptly. At the end of 1999, repayments of €3.7 million were outstanding against invoices issued since entry into force. For financial year (FY) 1999 alone only €450,000 was paid against invoices of €2.2 million. For FY 2001 more realistic estimates of the likely income were being made, but by the end of the year only some €45,000 had been received, compared to an invoiced €2.8 million.

Such a system is inherently likely to create cash-flow problems. This has been exacerbated at the OPCW by the way in which planning for verification of destruction programmes has been done. The estimates of particular types of verification activity required have often been flawed because they were based on over-optimistic destruction plans submitted by states parties. Certain states parties have resisted budgeting based on more realistic estimates. This has led to ‘phantom’ or ‘fictitious’ budgeting of expenditure for which income will never be received.

Finance reforms already adopted

Several steps have already been taken to remedy the OPCW’s financial problems, and these are to be commended. First, to manage the shortfall in funding, the requirement to repay unspent monies to states parties was suspended in 2000, allowing the 1999 surplus to be retained. Some states parties have also paid their dues in advance, giving the OPCW a one-off overdraft facility. Access to the organisation’s Working Capital Fund without a requirement to repay it the same year is under consideration. Measures have been taken by the Secretariat to speed up the invoicing of possessor states, and it has been agreed that they should pay for staff salary costs immediately an inspection has taken place. Ideas are also being considered to encourage advance payment of the salary-related costs. Quarterly rather than annual budgets for different areas of the OPCW are being established to allow activity levels to be better adjusted to match income.

Longer-term remedies: financial systems

The OPCW’s financial management systems need overhauling. A pragmatic rather than political approach is required to the ‘possessor pays’ problem. States parties need to acknowledge that Russia is unlikely to be able to pay its verification costs in full and on time. There is no indication that states parties would be willing to switch completely to an assessed funding arrangement and abandon the ‘possessor pays’ principle entirely. This would in any case require a treaty amendment. Some help must however be offered by states parties, probably by an increase in the Working Capital Fund. There may be objections from some that they would effectively be subsidising the possessor states. But the alternative is that full implementation of the CWC will be indefinitely thwarted. Moreover, the largest additional contribution would fall to one of the possessor states, the US, which is also helping to fund the Russian destruction programme. In most cases the additional cost to each state party would be small. In the last resort, such contributions could be made voluntarily by states parties which felt they could afford it.

Some organisations have found it helpful to have a system of end-year flexibility, allowing the roll forward of funds not spent to the next financial year, provided they were later applied to the activities for which they had been approved in the Strategic Plan. This arrangement is used in the UK for managing government expenditure. It usually improves the value for money obtained by avoiding end of financial year spending surges and could help avoid crises like those experienced in the OPCW in 2000 and 2001. Had such a system been in place in the early years, the Secretariat would have been able to invest the surpluses and manage its finances more prudently.

Longer-term remedies: strategic planning

To date, there seems to have been an insufficiently close relationship between the OPCW's strategic and financial planning. At the moment, the Secretariat produces a Medium-Term Plan which is presented to the Executive Council and the CSP. There appears, however, to be little interest among states parties in its content and they seem to have no real involvement in drawing it up or in reviewing progress in its implementation. In contrast, the CTBTO Preparatory Commission's Working Group B has such a debate and gives the Provisional Technical Secretariat notable guidance on priorities to help it prepare the budget. At the IAEA the guidance comes more from the detailed process of preparing for each meeting of the Board of Governors.

The OPCW also seems to operate on a relatively short planning cycle for an organisation with such complex tasks, and does not have a formal budget and planning committee, instead making use of its informal facilitation process. Longer-term planning would allow the OPCW as a whole to better understand how the Secretariat's financial position relates to the convention's priorities. The World Health Organisation (WHO) already operates on a two-year budget cycle and may be a useful interlocutor with the OPCW on strategic planning processes.

Reforming the current method of preparing the Medium-Term Plan will however require careful thought, since it is difficult to envisage broad agreement being reached among the OPCW's stakeholders in the same way it would in a national government department or a business. In the OPCW case it would often require a public retreat by states parties from a known political position. For example, there are strong public differences between those states parties which see the primary purpose of the OPCW as disarmament, those which see nonproliferation as its key task and those which want it to focus on facilitating the peaceful uses of chemistry in developing countries.

Nevertheless, mechanisms could be found to allow the Secretariat and regional representatives of states parties to collaborate in drafting key elements of the Strategic Plan. This should ideally be done informally at a very early stage, for example, in joint brainstorming meetings or off-the-record meetings away from the normal place of business ('away days'). Representatives from national capitals could also be invited if appropriate. There are precedents for such an approach by international organisations—for instance, the UN Security Council retreats inaugurated in the past few years. A side effect might be the development of a more co-operative atmosphere between the Secretariat and states parties. The Budget and Planning Committee could then take a more active interest in the presentation and regular monitoring of the Medium-Term Plan without the public posturing of an Executive Council session, encouraging a more conducive environment in which to discuss the replanning and reprioritisation which is likely to be necessary during the financial year.

Recommendations

Governance

- States parties should consider appointing the Chair of the Executive Council for two-year periods, to allow him or her to develop expertise in the complexities of the CWC. This might be a strain on smaller delegations when they supplied the Chair, but their governments could post additional staff for the period of office, and this is in any case unlikely to happen often.
- States parties should seek greater engagement of the Council's Vice-Chairs and regional group co-ordinators in the work of the facilitation groups. The Vice-Chairs should seek to deliver the views of their various regional groups and, where the regional group framework is not working effectively, should consider encouraging the establishment of sub-regional groups to clarify positions and help consensus develop.
- The Chair of the Council and the new Director-General should hold joint briefing and consultation meetings with the regional groups to encourage a shared view of problems and a sense of shared responsibility for finding appropriate solutions.
- States parties should ensure that their OPCW delegations have previous multilateral experience. An alternative would be to allow longer handover periods for staff joining and leaving delegations, or arranging short-term secondments to the Secretariat.

Management

- The new Director-General should conduct an early review of personnel issues. Such a review might first examine whether the disposition of staff within the Secretariat matches the strategic priorities of the organisation as defined in an improved Medium-Term Plan.
- As part of the review, a range of actions should be considered to help overcome staff retention, motivation and morale problems. These should include moving away from UN scales of pay to a more flexible pay and staffing system, abolition of the seven-year tenure rule, and possible accreditation to an internationally recognised 'people quality standard' to improve line management and internal communications.

Finance

- Existing plans to reform financial management should be implemented as soon as possible.
- A more thorough review of OPCW financing and financial systems should be commissioned by the Director-General before budgets rise to deal with higher activity levels. Such a review could be tasked with proposing ideas to put to the Executive Council and be conducted by a panel comprising regional representatives of states parties, external management and financial consultants and representatives of other international bodies.
- The review should build on current plans to ease the problems caused by the 'possessor pays' principle, including:
 - * more flexibility for the Secretariat in repaying borrowings from the Working Capital Fund;
 - * an increase in the Fund to bridge the gaps between verification expenditure and reimbursement through states parties making a one-off additional payment based on the normal scale of assess-

- ments. The extra money could be ring-fenced for destruction-related verification costs and repaid to states parties when all invoices had been settled at the end of the destruction period;
- * consideration of End Year Flexibility for the OPCW budget, which would require the ending of automatic repayment of annual surpluses to states parties;
 - * a longer-term, possibly three-year, financial and strategic planning cycle with greater involvement of states parties; and
 - * the establishment of an Executive Council Budget and Planning Committee, with open-ended membership and regional group representation and procedures for engaging the Secretariat in its work.

Confidentiality and transparency

Confidentiality within the OPCW

The OPCW as a whole—that is, both states parties and the Secretariat—has cultivated a more secretive and opaque operational culture than is necessary. This appears to stem from the way in which the Confidentiality Annex, an integral part of the CWC, has been implemented. It has resulted in a tendency on the part of both the Secretariat and states parties to over-classify information and to restrict the availability and distribution even of unclassified information between states parties and the Secretariat and to NGOs and the general public. Nevertheless, some material is accessible. For example, each state party's declarations are available to all other states parties on request, although few seem to take the opportunity to obtain them, and many documents of the Conference of States Parties and Secretariat are available to the public on the OPCW website.

In considering their approach to confidentiality and transparency, states parties should take as a starting point the first paragraph of the Confidentiality Annex, which restricts the obligation to protect confidential information to the verification of civil and military activities and facilities. States parties need to consider how best to create a climate of mutual trust and reassurance and be aware of the additional costs of excessive confidentiality.

Accessibility to the general public

There have been some praiseworthy innovations in increasing the openness of the OPCW to the outside world. These include the secondment to the OPCW since 1993 of a researcher from the Harvard–Sussex Program, which allows summarised reports of OPCW activity to be published in the 'Progress in The Hague' feature of the HSP's *CBW Conventions Bulletin*. The OPCW website is also available to the general public, and its recent upgrading to include a search facility is welcome. The website would be a good vehicle for further improving electronic accessibility.

Physical accessibility, especially for outside specialists, could also be significantly improved. At the moment there is no procedure for academics or NGOs to have regular access to the OPCW building—other than for specific appointments with Secretariat staff (who are generally helpful) or to attend meetings of the CSP—except on the basis of a separate decision each year. Because many of the meetings of

the OPCW's organs other than those of the Conference are held in private, and their documents are not all made public, whether they relate to confidential matters or not, there is difficulty in obtaining information about them even for use by national parliaments. This is leading to a 'democratic deficit' in the OPCW compared to other arms control and disarmament organisations.

The Executive Council rules are silent about whether its sessions could be open to the public. In contrast, the Statute of the IAEA Board of Governors explicitly allows it. The Council's rules on NGO attendance at its sessions is also more restrictive, allowing them to do so only 'on a case by case basis... if the consideration of a particular agenda item of the meeting so requires'. This compares unfavourably with the IAEA's more open rule which simply allows the Board of Governors to invite any NGO or individual to attend its meetings. A more flexible rule would allow chemical industry association representatives, NGOs and academics to observe meetings unless a decision were made to hold a particular session in private.

There are also good models for better access for NGOs, for example, the UN Economic and Social Council (ECOSOC) and the IAEA. These require NGOs to apply formally for consultative status, giving details of their interest in the field and their governance and funding details. Recommendations are then made by the relevant secretariat to the states parties as to whether or not such status should be granted.

While there might be concern that the presence of NGOs would be a nuisance for delegations, the number of NGOs interested in the minutiae of the OPCW's work is tiny and their members are all dedicated professionals. NGO involvement would enhance the work of the OPCW by extending its stakeholder base into civil society. Privileges could be readily withdrawn from any NGO which abused them.

Relations with industry

The OPCW has also been less engaged with the chemical industry than might have been expected given its considerable involvement in the negotiation of the convention and the importance of industry's co-operation in its implementation. In the first few years after entry into force there were formal annual meetings between Secretariat and industry representatives, usually at the same time as meetings of National Authorities and Secretariat representatives. Comments in the *Journal of the International Union of Pure and Applied Chemists* after the first meeting and private comments since suggest that the meetings were one-way OPCW briefings rather than dialogues. No meetings were held in 2001 because of financial constraints, although informal contacts continued regularly, including through members of the Scientific Advisory Board with connections to industry.

Contacts at the national level between states parties and their own industries are variable and have in some cases declined as the implementation of the convention has proceeded. This may reflect the heartening fact that industry has encountered fewer problems with the inspection system than was feared.

There is a strong case for considering the chemical industry as a partner in the CWC, rather than an external community or, worse, an antagonist. A more systematic approach to consultations between industry and both the Secretariat and states parties is needed. This might take the form of an industry board along the lines of the Scientific Advisory Board, comprising representatives of chemical industry associations or their equivalents from all regional groups, meeting perhaps twice a year with the Secretariat and the Executive Council to discuss problems relating to implementation of the convention. Such a board should also have input into the strategic planning process of the OPCW.

Recommendations

- The OPCW should seek a better balance between the legitimate need to preserve the confidentiality of some information and the principles of openness and transparency which are the foundation for building confidence between states parties and between them and the OPCW. States parties should consider whether all the confidentiality restrictions currently imposed by the OPCW relate strictly to verification and adopt a policy that information be released unless there are compelling grounds for not doing so.
- States parties should pay careful attention to the classification they give to material they submit to the Secretariat and each other, seeking to keep it as low as possible; they should also urge their industries to be more open in providing CWC-relevant information, impressing on them that much material is available anyway from open sources such as websites and trade directories.
- The OPCW should also establish a mechanism for appeals against decisions to classify or restrict information, along the lines of national freedom of information acts.
- The following steps would help improve the present public appearance of a closed culture and bring the OPCW more into line with modern practice, including elsewhere in the UN system:
 - * allowing the Executive Council to decide what sessions should be open to the public, rather than assuming that all must be private;
 - * allowing the Council to invite any NGO or individual to attend any of its sessions;
 - * making Council documents public unless an express decision is taken to keep them confidential;
 - * instituting a better system for access by NGOs to the OPCW, for example, by according them consultative status. Those given such status would be permitted to attend all meetings of the CSP and the Executive Council unless an express decision were taken to keep a particular meeting private. NGOs should be allowed to request permission to address the Council;
 - * facilitating access by registered NGOs to OPCW public documents, and creating a special list for distribution of such documents by mail or e-mail; and
 - * allowing registered NGOs access, with a suitably restricted pass, to certain areas of the OPCW building, including the coffee lounge and library.
- The Review Conference should consider a more systematic arrangement for consultations with the chemical industry, for example, through the establishment of an industry board along the lines of the Scientific Advisory Board, with a relationship to both the Executive Council and Secretariat.

Conclusion

The immediate post-cold war environment which made the negotiation of the CWC possible has changed. Enthusiasm for intrusive multilateral verification has dimmed and it seems unlikely that the same regime could be easily negotiated today. Moreover, the treaty's emphasis on verifying the destruction of the enormous US and Russian CW stocks, rather than the threat of CW acquisition by new states and non-state actors, now seems misplaced. This has become even more apparent since the terrorist attacks on the US on 11 September 2001 which reinforced a growing awareness that the true threat of CW acquisition and use may come from terrorists, rather than from states.

Nonetheless, despite these largely unforeseen developments, the CWC remains an invaluable bulwark against CW proliferation and use. Since it cannot be renegotiated, it must be implemented as effectively and efficiently as possible as it stands. While the OPCW and states parties made an impressive beginning in the early years after entry into force, the regime has recently shown signs of misgovernance, mismanagement and benign neglect. These must all be rectified by the combined efforts of states parties and the Secretariat. Not only because of the continuing threat of chemical weapons, but because in many respects the CWC's verification regime is a model for future arms control and disarmament treaties, it cannot be allowed to fail. The First Review Conference in 2003 is a perfect opportunity to deal with those challenges that cannot be dealt with in the meantime by the new OPCW leadership and by states parties individually.