Nuclear Disarmament and Non-Proliferation: the Role of the Nuclear Non-Proliferation Treaty

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Introduction

The seminar on *Nuclear Disarmament and Non-Proliferation: the Role of the Nuclear Non-Proliferation Treaty (NPT)* held at Jan Smuts House, Wits University on 29 March 2000 was inspired by the March 1999 Tokyo meeting convened to discuss nuclear non-proliferation and disarmament. The Tokyo meeting was jointly sponsored by the Konrad Adenauer Foundation (KAF) of Germany, the International Institute for Policy Studies (IIPS) based in Tokyo and Harvard University's Belfer Centre for Science and International Affairs (BCSIA).

As the KAF, IIPS and BCSIA meeting emphasised, the global nuclear non-proliferation and disarmament process is not limited to a small number of global powers, but is rather a broad undertaking which should encompass states from both the northern industrialised nations and the southern developing nations. Moreover, the Tokyo participants called on other academic institutions, think tanks and civil society organisations to further the debate on nuclear non-proliferation and global nuclear disarmament.

Given that South Africa was the first state to produce clandestinely and then dismantle and destroy nuclear weapons, it seemed appropriate to take up the challenge of the Tokyo meeting and extend the debate on nuclear non-proliferation at a seminar in Johannesburg. South Africa's fervent anti-nuclear policy – consolidated after the country's first democratic elections in 1994 – also provided an inspirational model to other states possessing, or considering the manufacture of, nuclear weapons.

The seminar was held just a few weeks prior to the 2000 Nuclear Non-Proliferation Review Conference in New York and was specifically intended to provide suggestions and policy options for South Africa's participation in the conference. South Africa had played the role of diplomatic bridge-builder at the 1995 NPT Review and Extension Conference providing a compromise option which largely facilitated Non-Aligned Movement (NAM) support for the indefinite extension of the NPT. Given the pessimistic forecasts for the 2000 NPT Review Conference, the seminar sought to identify possible compromise positions and diplomatic options for the meeting in New York. South Africa's leading role in the New Agenda Coalition and its influence within the nuclear disarmament debate at the Geneva United Nations Disarmament forum provided the background for the debate.

The seminar brought together a group of academic specialists and policy practitioners to investigate the NPT review process, nuclear disarmament as a whole and the possibility of the eventual total elimination of nuclear weapons. Both India and Pakistan, the newest members of the nuclear club, were given an opportunity to outline their policies on the NPT and to exchange views on possible nuclear disarmament. Representatives of the United States and Russia provided perspectives on bilateral nuclear disarmament processes and outlined stumbling blocks to further cooperation.

The range of papers presented and the exchange of views advanced the seminar's primary objective of providing suggestions and policy options for the 2000 NPT Review Conference. South Africa's important role, since 1994 and especially at the 1995 NPT Review and Extension Conference, in promoting

the NPT was highlighted and encouraged. In addition, official South African, Indian and Pakistani views of the NPT helped to clarify differences within the developing world on nuclear weapons and the role of weapons of mass destruction in military deterrence and international diplomacy. The seminar echoed many of the findings of the Tokyo meeting, especially the importance of continuing debate on the NPT and nuclear disarmament, to avoid the complacency of early post–Cold War thinking which advanced the view that nuclear disarmament was inevitable. The broad conclusion of the proceedings suggested that nuclear disarmament remains a critical issue requiring sustained attention and global participation in the NPT disarmament process which aims finally to rid the world of the means of its own destruction.

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Welcoming Remarks

Michael Lange

INTRODUCTION

On behalf of the Konrad Adenauer Foundation (KAF), I would like to extend a very warm welcome to you all. This is the first workshop to be organised by the South African Institute of International Affairs (SAIIA) and the Peace Studies Group of Wits University's Department of International Relations, in collaboration with KAF. After unsuccessful attempts last year to organise a joint venture of this nature, I am especially pleased that we were able to succeed this time.

The nuclear non-proliferation issue seems to me to be as much an important as an unfamiliar topic to the majority of the general public as well as to most of the academic community. Looking at the audience, I am tempted to assume that practically all those who have ever heard of, or dealt with, the issue of nuclear non-proliferation in South Africa, are present.

At the outset, let me express my gratitude to you all for spending some of your valuable time with us today, and participating in a workshop that has been designed to introduce for discussion, different current perspectives regarding the situation and future challenges of nuclear non-proliferation.

1. A BACKGROUND TO KAF

For those wondering what type of institution KAF is and why it has sponsored this workshop, allow me briefly to outline some of the reasoning behind KAF's involvement in South Africa in general, and in this workshop in particular.

KAF is one of Germany's five political foundations, which are a unique feature of today's democratic culture in Germany. The move behind their creation, which dates back to the1960s, was the expectation that political or civic education would help develop and consolidate democracy in post-war Germany.

KAF has been cooperating with partners throughout the world ever since the 1970s, when the German government decided to allow, or rather enable, the political foundations to extend their reach to foreign countries and to engage in civic education activities abroad.

With the help of 85 offices and a corresponding number of representatives all over the world, KAF today assists in strengthening the concept of a multiparty democracy and helps to implement human rights, social justice and the rule of law.

With approximately half the Foundation's total budget of some DM 200 million being invested towards these objectives, we believe we are playing a significant role in political education and dialogue, as well as in shaping international relations.

As a result of the work undertaken by KAF, especially in developing countries, we have chosen the promotion of multiparty democracy as our most important focus. We have become convinced that the creation and consolidation of a democratic political framework is one of the essential conditions on which any development process depends.

Our main reason for getting involved in seminars, workshops and other educational activities in countries such as South Africa, and particularly those involved in transformation, is to strengthen institutions and structures that guide

the development of a constitutional and legal order, that favour the consolidation of the rule of law and that contribute to a culture of an open dialogue on all political and societal issues of relevance, as is the case with your institute.

2. KAF IN SOUTH AFRICA

In South Africa, KAF therefore cooperates in this respect, not only with political parties and their respective think-tanks but also with reputable education and research institutions, as can be seen from today's event.

Some of our main projects have concentrated on constitutional development at national, provincial and local levels, as well as on good governance – including training of government officials – and economic development, with an emphasis on the social upliftment of disadvantaged peoples.

The Foundation aims to contribute to the dialogue around the fundamentals of a liberal democracy from a Christian Democratic viewpoint and, while so doing, enhances the culture of academic exchange among citizens.

This is done not only in the country's metropolitan areas, but also in provinces such as KwaZulu-Natal, where we are engaged in civic education programmes in cooperation with the Institute for Federal Democracy (IFD), promoting democratic and socio-economic development while providing support specifically for the rural areas. In the Northern Province we assist the provincial government in its attempt to unify the different local administrations.

We provide expertise from Germany and utilise the tools available to us to further our objectives. This includes international and national seminars and workshops such as this one; short-term expertise; study tours to Germany; research programmes and, where appropriate, publications through our series of seminar reports and occasional papers.

We also engage in scholarship programmes to allow promising young students from disadvantaged communities to receive the training necessary to contribute as much as possible to the transformation and development of the South African society. Let me take this opportunity to mention our scholarship/internship programme that we run with this institute. We are currently sponsoring four master degree students who, while doing their course work, spend their remaining time as interns in the professional environment of an academic institution. This, we believe, will enhance their ability to adapt to their future work environment much more smoothly than without such an internship.

All this, I believe, clearly shows the importance that KAF gives to developments in South Africa and we are very grateful to Wits University's Department of International Relations for allowing us to play our part in this.

3. NUCLEAR NON-PROLIFERATION AND THE FUTURE

Turning now to why KAF responded favourably to the request by Dr Shelton to help organise a workshop on nuclear non-proliferation, I draw your attention to the fact that during March 1999, KAF together with the International Institute for Policy Studies (IIPS) based in Tokyo and Harvard University's Belfer Center for Science and International Affairs (BSCIA), held a first joint meeting to discuss nuclear non-proliferation and disarmament.

Today's workshop can therefore be considered as a follow-up meeting, deliberately scheduled ahead of the Nuclear Non-Proliferation Treaty (NPT) Review Conference in April this year, to take stock of what has been taking place in this field since the last workshop.

As we look to the future of mankind in the 21st century with the aim of building a peaceful world, issues relating to security – and therefore particularly problems of nuclear non-proliferation and nuclear disarmament – require our urgent attention.

The explosion of nuclear devices by India and Pakistan in May 1998 reminded the world that the continuing reduction in nuclear weapons as witnessed over the past decade is not inevitable, neither is the commitment of nations to nuclear disarmament universal.

To prevent the world from returning to nuclear horror and to dissuade the resumption of a nuclear arms race, all nations must contribute to efforts to rid the world of these terrible weapons. The international non-proliferation regime seems at present to be threatened in several fundamental ways.

In a recent statement, United Nations Secretary General Kofi Annan said that it is difficult to approach the up-coming non-proliferation conference with optimism, given the discouraging list of nuclear disarmament measures in

suspense, negotiations not initiated and opportunities not taken.

The 1993 Strategic Arms Reduction Treaty (START II) between the United States (US) and Russia has not come into force and START III talks have not even begun.

The Comprehensive Test Ban Treaty (CTBT) has recently been rejected by the US Senate and the envisaged deployment of a ballistic missile defence system seems increasingly likely, posing a serious threat to the Anti-Ballistic Missile Treaty and the strategic stability it embodies.

The US proposes modifications to the 1972 treaty, which would sharply limit anti-missile defences, so as to build a system capable of countering missiles launched by what it regards as "rogue states", but not a mass attack by a nuclear power. On the other hand, Russia and China oppose any modification of the treaty signed by the US and the then Soviet Union, on the premise that an anti-missile shield would only tempt the other side to build more missiles in the hope of breaching defences, thereby undermining the global strategic balance.

Under these circumstances, many believe that the upcoming Review Conference should be seen as an opportunity to reassess and strengthen the NPT. While India and Pakistan should immediately join the CTBT without pre-conditions, the nuclear powers should do their best to bring about a timely ratification of the CTBT.

CONCLUSION

The purpose of this workshop is to allow the experts to produce a common understanding of the issues involved and to attempt a thorough discussion of the ways to cope with the challenges posed by the current situation.

Let today's workshop be an example of the much needed cooperation between government and research institutions such as the SAIIA, in analysing the treaty and its effect on world politics.

Let this workshop be our humble contribution to the debate on the future of nuclear non-proliferation.

South Africa and the Nuclear Non-Proliferation Treaty: Bridging the North–South Divide on Nuclear Weapons

*Garth Shelton**

"*I believe that the South African experience – namely, that security is provided by nuclear disarmament rather than by nuclear proliferation – is a telling one; not only for the 'threshold' states, but also for the 'acknowledged' weapon states."*

Alfred Nzo, South African Foreign Minister, 1995[1]

INTRODUCTION: THE 1999 TOKYO MEETING AND THE NPT

During March 1999 the Konrad Adenauer Foundation (KAF) of Germany, the International Institute for Policy Studies (IIPS) based in Tokyo and Harvard University's Belfer Centre for Science and International Affairs (BCSIA) held a joint meeting in Tokyo to discuss nuclear non-proliferation and disarmament. The meeting was prompted by what is now considered to be a new stage in nuclear proliferation following the May 1998 weapons tests by India and Pakistan. The Indian and Pakistani tests are widely viewed as the starting point of the second age of nuclear weapons proliferation, following the first nuclear age of United States (US)–United Soviet Socialist Republic (USSR) ideological rivalry. The optimism of post–Cold War nuclear arms control and disarmament specialists has been dampened by the new wave of nuclear testing and the future of nuclear non-proliferation has been brought into question. Consequently, there is an urgent need to consolidate the post–Cold War nuclear disarmament process and to refocus international attention on nuclear non-proliferation with the hope of building a stable and non-threatening global strategic environment.

Non-governmental research institutions can play an important role in promoting nuclear non-proliferation and assisting governmental stakeholders to seek solutions to nuclear disarmament issues. The KAF, IIPS and BCSIA have thus sought to promote debate and discussion on nuclear disarmament with a view to seeking new and innovative solutions applicable to present proliferation concerns. The Tokyo meeting issued an important joint proposal intended to promote discussion on nuclear disarmament and to initiate international dialogues with research institutions in other countries. The Tokyo meeting pointed out that the world has grown complacent about the threat of nuclear weapons proliferation and the need to devise mechanisms to prevent further proliferation while reducing existing nuclear arsenals. The Indian and Pakistani nuclear tests have issued a warning that a continuation of the post–Cold War nuclear disarmament trend is not inevitable, nor is the global commitment to nuclear non-proliferation universal. In order to promote international stability and to prevent further nuclear weapons testing, the Tokyo meeting called for a renewed effort to encourage nuclear disarmament. The joint proposal released at the conclusion of the Tokyo meeting outlined a number of key issues:

- The need to stop the leakage of nuclear materials and expertise from the former Soviet Union, which threatens to severely undermine the international non-proliferation regime. The need to stabilise Russia's

*The author wishes to acknowledge the assistance of the US Information Resource Centre, US Embassy, Pretoria, in the preparation of this paper.

nuclear sector was identified along with the enhancement of nuclear security. International engagement was considered an urgent priority to contribute to ending nuclear leakage.

- Strengthening the Nuclear Non-Proliferation Treaty (NPT), especially adherence by the nuclear weapon states (NWS) to Article VI of the treaty which calls on China, France, Russia, the United Kingdom (UK) and the US to do more to implement the treaty through accelerated and verifiable nuclear disarmament. Other priorities linked to the NPT are the entry into force of the Comprehensive Test Ban Treaty (CTBT), along with India and Pakistan's commitment to adhere to the CTBT; the implementation of a Fissile Materials Cut-Off Treaty (FMCT) to limit nuclear weapons stockpiling; employing effective sanctions to prevent illegal nuclear weapons programmes such as those in Iraq and North Korea; enhancing the Missile Technology Control Regime (MTCR) and the London Guidelines for nuclear and related technology transfers; and strengthening the NPT via the April 2000 NPT Review Conference.
- The complete ratification of the Strategic Arms Reduction Treaty (START) II and the fulfilment of obligations as soon as possible after entry into force. Thereafter the US and Russia should be encouraged to complete the negotiation of START III with a view to the verifiable reduction of nuclear warheads as the first step towards a comprehensive warhead control regime in the longer term. In this context, unilateral nuclear arms reduction was encouraged as a means of creating the right environment for a comprehensive agreement. Moreover, the need for multilateral arms control negotiations was identified as a prerequisite for improving the credibility of NWS and increasing the confidence of the international community.
- NWS were called on to help reduce the risk of accidental nuclear detonations by de-alerting nuclear forces as a means of preventing the actual use of nuclear weapons inadvertently, or intentionally. In addition, the international community should decide on a coordinated response to any actual use of nuclear weapons.
- The nuclear disarmament process should be transparent and verifiable. All procedures for the removal of nuclear warheads, the transport, storage and dismantling should be open to international verification measures and the details made available to all interested parties. All NWS should be required to provide a complete list of all nuclear weapons, as well as spare parts and related components in order to measure the nuclear disarmament process.
- All the separate elements which together constitute the Nuclear Non-Proliferation Regime should be included in an all-embracing umbrella convention based on United Nations (UN) Resolution A/RES/53/77U B "Nuclear Disarmament with a View to the Ultimate Elimination of Nuclear Weapons," introduced by Japan to the 1998 UN General Assembly and adopted with 160 in favour, none against and 11 abstentions. The proposed multilateral framework convention for nuclear disarmament should be discussed as soon as possible with a view to the elimination of all nuclear weapons in the long-term.[2]

As the KAF, IIPS and BCSIA Tokyo meeting emphasised, the nuclear non-proliferation and disarmament process is not limited to a small number of global powers, but is rather a broad undertaking which should encompass states from both the Northern industrialised nations and the Southern developing nations. As the first state clandestinely to produce and then dismantle and destroy nuclear weapons, South Africa must be considered a special participant in the nuclear non-proliferation process. Moreover, South Africa's fervent anti-nuclear policy – consolidated after the country's first democratic elections in 1994 – provides an inspirational model to other states possessing or considering the manufacture of nuclear weapons. This paper will thus:

- outline the global nuclear non-proliferation and disarmament process, paying particular attention to the NPT and the non-proliferation regime
- examine South Africa's initial rejection of the NPT, clandestine nuclear weapons programme and denuclearisation, with specific emphasis on the lessons of South Africa's experience
- analyse South Africa's post-1994 nuclear non-proliferation policy and the county's role in strengthening the NPT
- lastly, this paper will suggest some policy

options for South Africa as a member of the Non-Aligned Movement (NAM) and as a supporter of the NPT for consideration at the 2000 NPT Review Conference.

1. GLOBAL NUCLEAR NON-PROLIFERATION AND DISARMAMENT

During the Cold War it became clear that disarmament could not be undertaken independently of the underlying political and strategic conditions. The termination of the Cold War has, however, led to a new, less threatening international environment and provided the necessary preconditions for nuclear disarmament.

According to many observers, global conditions are now appropriate for meaningful progress towards significant nuclear disarmament and the building of a new nuclear free security environment. Nuclear weapons remain the most destructive and terrifying weapons ever produced and continue to threaten humanity with their ability to cause mass destruction. As long as stockpiles of nuclear weapons exist, even in small numbers, the danger of nuclear war remains a major threat in many regions of the globe. Consequently, nuclear weapons must remain a central priority for arms control and disarmament processes. The final document of the first special session of the UN General Assembly devoted to disarmament (SSODI), drafted in 1980, specifically placed nuclear disarmament at the top of the disarmament agenda. That priority remains unchanged 20 years later.

The nuclear arms race came to an end with the termination of the Cold War, but the continued existence of large quantities of nuclear weapons requires a sustained momentum to ensure long-term nuclear disarmament. The challenge of the 21st century is to accelerate the post–Cold War trend of nuclear disarmament, bringing about maximum weapons reductions to the lowest possible level consistent with security. Significantly reducing existing nuclear weapons arsenals of the NWS is not likely to alter the overall strategic balance, or undermine national deterrence policies. Consequently, pressure on the NWS to further reduce nuclear weapons stockpiles with a view to a significant build down over the longer term should be increased. At the same time, nuclear disarmament should be undertaken within the broad context of post–Cold War demilitarisation, which has as its objective the guarantee of global peace and security by eliminating the possibility of military aggression and the ability to use force to occupy the territory of other states. In other words, demilitarisation should ensure that each state possesses only the military assets sufficient to defend national sovereignty and to ensure domestic stability, and does not pose a threat to any other state.

1.1 The nuclear non-proliferation regime

The Nuclear Non-Proliferation Treaty (NPT) is the key element in a complex framework of treaties, bilateral agreements and multilateral inspection procedures aimed at preventing the horizontal proliferation of nuclear weapons and related materials. Opened for signature in 1968, with entry into force two years later, the NPT specifically divides the world into nuclear "haves" (countries which tested nuclear weapons before 1 January 1967, namely the US, USSR, UK, France and China) and nuclear "have nots" – all other sovereign states. The NPT was specifically intended to consolidate the possession of nuclear weapons in the hands of the five recognised nuclear powers, while preventing the emergence of a sixth nuclear state. Consequently, in terms of the NPT, non-NWS pledge not to manufacture or receive nuclear weapons as well as allow international inspections at all nuclear facilities ("full-scope safeguards") to ensure compliance. All NPT signatories agree not to export nuclear equipment or material except under safeguards, while at the same time they undertake the fullest possible sharing of peaceful nuclear technology. In order to balance the responsibilities of the non-NWS, all NPT signatories are required to pursue negotiations in good faith to achieve nuclear disarmament under international control. The Vienna-based International Atomic Energy Agency (IAEA), established in 1957, is responsible for facilitating the use of nuclear energy for peaceful purposes and to implement audits of nuclear material and on-site inspections of nuclear facilities to verify that nuclear activities are not being conducted in order to manufacture weapons.

Two informal alliances of nations that voluntarily restrict the export of nuclear equipment and materials that could be used to manufacture nuclear weapons have been established since the entry into force of the NPT. The NPT

Exporters Committee (Zangger Committee) adopted a set of nuclear export guidelines in 1974 – the so-called "trigger list," which would trigger the requirement for IAEA safeguards in recipient states. The Nuclear Suppliers' Group (NSG), also known as the London Group, adopted similar guidelines to the Zangger Committee, while extending restrictions to include uranium-enrichment or plutonium-extraction equipment. The Wassenaar Arrangement, set up in July 1996, further expanded the NSG and Zangger restrictions to include exports of conventional arms and dual-use technologies which could be used in the manufacture of weapons of mass destruction. Regrettably, these informal nuclear suppliers' alliances and restrictions were established without consultation with the majority of NPT signatories.

Nuclear weapons free zones (NWFZs) have been instituted in a number of regions in order to supplement the NPT. NWFZs are intended to exclude nuclear weapons from a particular region on the basis of an international agreement freely arrived at by participating states. The establishment of NWFZs are regarded as important contributors to the establishment of regional peace and security, while at the same time making a significant contribution to the complete elimination of nuclear weapons. NWFZs have been established in Latin America (Treaty of Tlateloco, 1967), the South Pacific (SPNFZ, 1996) and Africa (ANWFZ, 1996). Mongolia has declared itself a nuclear-free zone, while other possible areas identified for the establishment of NWFZs are Southeast Asia, the Middle East and South Asia, Central Europe and Central Asia. The key to the success of a NWFZ is of course the voluntary participation and commitment of member states.[3]

The Comprehensive Test Ban Treaty (CTBT), opened for signature in New York on 24 September 1996, is an instrument designed to prevent both vertical and horizontal nuclear proliferation by banning all nuclear weapons testing. The CTBT prohibits nuclear weapons testing of any size, above or below the earth's surface, and establishes a comprehensive verification system including 320 seismic monitoring stations and on-site inspections to detect treaty violations. Some states, especially the NWS, supported the CTBT, arguing that the treaty would prevent the testing of nuclear weapons and hence discourage proliferation, as nuclear threshold states would not be able to test and thereby become full members of the nuclear club. However, the majority of supporters saw the CTBT as an excellent means of promoting nuclear disarmament by requiring NWS not to test nuclear weapons, bringing about the gradual obsolescence of existing nuclear weapons stockpiles. Moreover, without testing, NWS would be discouraged from the further development and qualitative improvement of nuclear weapons. (Although super-computers can mimic nuclear explosions, without real tests, confidence in weapons will be significantly eroded over time. The US continues with sub-critical underground explosions and computer simulations in order to enhance weapon effectiveness.)

Despite the obvious advantages of the CTBT in inhibiting nuclear proliferation and weapons development, the US Senate in October 1999 failed to ratify the treaty, citing doubts about verification and the long-term ability of the US to maintain a reliable and credible nuclear capability. However, with a planned 320 seismic and environmental monitoring stations set to support the CTBT, the Senate's doubts about verification appear to be unfounded. In addition, $4.5 billion has been allocated to the Stockpile Stewardship Programme intended to ensure the safety and reliability of US nuclear weapons.

The Senate's decision to reject the CTBT has severely undermined Washington's ability to lead the non-proliferation debate, which could undermine the international moratorium on nuclear testing and weaken the NPT. According to Ambassador Thomas Graham, head of the US delegation to the 1995 NPT Review and Extension Conference, the US has reneged on its promise to ratify the CTBT. Enforcing the CTBT was a key US undertaking in 1995, along with a promise to work in good faith towards eventual total nuclear disarmament. Fearing the undermining of the 1995 NPT bargain and a consequent weakening of majority support for the NPT, German Chancellor Gerhard Schroder, British Prime Minister Tony Blair and French President Jacques Chirac appealed directly to the US Senate to ratify the treaty, but without success. The US rejection of the CTBT is certain to have a negative impact on the next NPT review conference and may

encourage other NWS to restart testing. Some observers believe the failure to ratify was a signal by the Senate that the US intends to launch a new programme to upgrade existing weapons systems. If the US does initiate a nuclear modernisation programme, Russia and China are likely to follow, while India and Pakistan may be encouraged to conduct further nuclear testing. (Of the 44 states that are required to ratify the treaty before entry into force, North Korea, India and Pakistan have not signed it.)

Forty years ago nuclear specialists expected there to be 30 NWS by the turn of the century.[4] With only eight NWS (US, Russia, Britain, France, China, India, Pakistan and Israel), this pessimistic forecast has fortunately proved inaccurate. In recent years the NPT has been substantially strengthened with the accession to the treaty of China, France, South Africa, Argentina, Brazil, Algeria, Belarus, Kazakhstan and Ukraine. With 187 signatories, the NPT now enjoys the widest adherence of any arms control agreement in history. Despite almost universal international acceptance of the NPT, there is widespread concern among the nations of the South that the nuclear non-proliferation regime is essentially a creation of the North, intended to perpetuate nuclear dominance by the existing NWS. Since the collapse of the Soviet Union, the main threat to the West has been broadly identified as the proliferation of weapons of mass destruction (WMD), especially nuclear weapons and long-range missile delivery systems.

Following the termination of the Cold War, Western foreign policy makers and military planners were faced with a so-called "threat blank" having no clear identifiable adversary to motivate policy making and planning. After operating for many years in a polarised international system, Western policy makers were unable to perform in a threat vacuum and thus energetically sought new candidates for the "clear and present danger" as a substitute for the former Soviet Union. Consequently, through a process of "threat inflation", Western policy makers elevated a handful of small countries to the top of a new strategic defence list and added the threat of nuclear proliferation along with chemical and biological weapons and long-range missiles. In response to the "threat blank", Washington's defence policy makers have identified new adversaries and a number of Third World countries have replaced the Soviet Union as the main threat to the US. Thus the deterrence and containment of the former USSR has been replaced with what Michael Klare calls the "rogue doctrine", which is essentially "the characterisation of hostile (or seemingly hostile) Third World states with large military forces and nascent WMD capabilities as "rogue states", or "nuclear outlaws" bent on sabotaging the prevailing world order."[5]

The threat of nuclear proliferation posed by so-called "rogue states" has now become the dominant feature of US and much of Western military planning in the post–Cold War period, largely because policy makers in the West simply adopted their Cold War conceptual template to fit a changed global environment. In terms of the new doctrine intended to deter rogue states, nuclear weapons would be required as long as there are rogue nations in the world. Moreover, improved military capabilities of rogue states, especially the development of ballistic missiles, requires the development and deployment of ballistic missile defence (BMD) systems. Third World states such as North Korea, Iraq, Iran, Syria and Libya, which were accorded minimal attention during the Cold War, were suddenly elevated to become major threats to Western security requiring the maintenance of a massive Cold War–style nuclear deterrent. Much of the Western and especially American, academic and policy making discourse on post–Cold War threats have assumed that Western anti-nuclear policies are "rational", while threats from so-called "rogue" states are self-evident.[6] States that do not support Western anti-nuclear policies are therefore regarded as irrational and dangerous. Hence, efforts to stem the horizontal proliferation and not the vertical proliferation of nuclear weapons, have become the new defence priority of Western governments. This approach neglects the assessment of the many countries of the South, which remain concerned about the West's global nuclear dominance and massive military overkill capacity. The failure to neutralise nuclear war fighting capability more than 10 years after the end of the Cold War remains inexplicable. The implication is that the West intends to use the nuclear threat as a means to dominate international relations. In the capitals of the Western nuclear nations, the threat posed by nuclear weapons to non-nuclear states is ignored and any suggestion

that the non-NWS need a nuclear deterrent to counter a threat from the West is considered dangerous and irresponsible. Western policy makers believe that the West has the right to enforce the nuclear non-proliferation regime and remain a "benign nuclear hegamon."[7]

Although the NPT is broadly supported by countries of the South, that support has been tempered by the realisation that the treaty institutionalises inequality by allowing NWS to retain a nuclear weapons capacity, but prevents other states from acquiring weapons. Some observers believe that during the 1960s the US and former USSR planned a nuclear condominium in order to retain global nuclear hegemony.[8] US support for the NPT has since the 1960s been linked to maintaining its own national security as well as maintaining a dominant role in the international system. US policy makers have not seen the NPT as a stop gap measure to prevent horizontal proliferation while vertical proliferation is reversed. During the 1970s and the 1980s, when non-NWS admonished the nuclear powers to implement Article VI of the NPT by committing to serious nuclear disarmament, they were accused of being "maximist" or unreasonable in their interpretation of the treaty, tending to confirm the view that the superpowers saw the NPT as a mechanism to prevent horizontal proliferation and not as an arms-reduction treaty intended to control vertical proliferation.

The first NPT Review Conference in 1975 produced a final statement, but it was a last-minute compromise which saved the conference from collapse. The second Review Conference in 1980 failed to produce a final report and Yugoslavia's threat to withdraw from the NPT threatened to undermine the nuclear non-proliferation regime. Disagreement over Article VI was the main bone of contention between the NWS and the other signatories to the treaty. An observer at the time, Joseph Rotblat, suggested that the incentive for non-aligned countries to adhere to the NPT was diminishing as they could "see no validity in a treaty systematically violated by its 'privileged' members."[9] Rotblat pointed out that Third World nations had a legitimate reason for concern over the lack of progress towards nuclear disarmament as the arms race had continued unabated throughout the 1970s. Acceptance of Article VI originally appeared to be a concession by the superpowers, but the lack of any detail in the NPT or time frame for the achievement of global nuclear disarmament, allowed the NWS to evade the fulfilment of treaty obligations.[10] The third NPT Review Conference also failed to produce a final report, but a decision to emphasise "progress" saved the NPT. The results of the 1990 Review Conference were not encouraging, again signalling a significant divide between the "haves" and the "have nots" over the future of the NPT.

The 1995 Review and Extension Conference opened with an imposing list of non-aligned criticisms levelled at the NPT:

- The NPT was criticised for institutionalising discrimination by freezing the number of NWS.
- Indefinite extension of the treaty was opposed by some, fearing this would legitimise nuclear weapons for all time.
- The NWS had not gone far enough in implementing Article VI of the treaty.
- The promised CTBT had not been concluded.
- Security assurances for non-NWS remained unconvincing,
- Fair terms of trade in nuclear material and equipment were not being implemented.
- Regional security issues, especially Israel's nuclear status, were not being adequately addressed.[11]

Serious divisions between the NWS and non-aligned signatories threatened to bring the conference to an end without an all important decision on renewal. South Africa – the new player on the block – suggested a critical compromise which saved the day and laid the foundation for the permanent extension of the NPT. South Africa was able to play a leading role as a consequence of a unilateral decision to dismantle nuclear weapons and to sign the NPT.

2. SOUTH AFRICA'S NUCLEAR PROGRAMME AND DENUCLEARISATION

During the original 1968 NPT debate in the UN General Assembly, South Africa made clear its support for the objective of non-proliferation and gave reassurance on uranium supply policies and nuclear plans. The South African representative emphasised that "one does not require special insight or foresight to realise the dangers to the security of the world inherent in the proliferation of countries possessing atomic weapons." He added that "this realisation moti-

vated South Africa, as one of the major producers of uranium in the Western world, to do absolutely nothing in the context of uranium sales to foreign buyers which might conceivably contribute to an addition to the ranks of the nuclear weapon states."[12] The General Assembly was reminded that South Africa had given formal assurances in this regard at the General Conference of the IAEA on 22 September 1966. South Africa gave the assurance that "in the context of uranium sales" it would "do nothing which might conceivably add to the number of powers with nuclear bomb capability." In addition, South Africa's representative emphasised that Pretoria's own nuclear programme was "devoted to peaceful purposes exclusively."[13]

The history of South Africa's objections to signing the NPT can largely be explained by Pretoria's desire to avoid IAEA inspections of nuclear facilities which were being used in the manufacture of nuclear weapons. During the 1970s and 1980s, South Africa had some serious doubts about the NPT, but clearly the central reason for not accepting the treaty was to maintain the secrecy of a nuclear weapons programme. South Africa's nuclear programme was outlined by former President F W de Klerk on 24 March 1993 in a major statement to the South African parliament. He confirmed that six nuclear weapons had been dismantled before accession to the NPT on 10 July 1991 and the signature of a Comprehensive Safeguards Agreement with the IAEA on 16 September 1991.

The story of South Africa's nuclear programme, originating during the 1950s, based on the country's significant uranium reserves and motivated by the Western-trained scientific community, is widely known. However, the reasons for South Africa's decision to produce nuclear weapons and the decision to opt for nuclear rollback in 1990 deserve renewed attention as the lessons of South Africa's costly nuclear adventure remain relevant to the ongoing nuclear debate.

The nuclear scientific community led by Ampie Roux, the "father" of South Africa's bomb, were active supporters of the programme. The decision to begin a nuclear programme was initiated on the basis of a 12-point programme drawn up by Roux in 1958. He later became head of South Africa's Atomic Energy Board (AEB) and directed the uranium enrichment programme leading to the production of the country's first nuclear device in 1977. (A second smaller bomb with a more advanced design was completed in December1982 and thereafter one weapon was manufactured approximately once each year, according to the production schedule of the enrichment plant.) Dr Anthony Jackson, leader of the team responsible for the design and commissioning of South Africa's pilot enrichment plant, has suggested that a breakthrough in the uranium enrichment process made the temptation to produce nuclear weapons "almost irresistible." According to Jackson, at that time, nuclear weapons "had massive prestige, independent of any perceived threat."[14]

According to official accounts, South Africa's nuclear weapon programme was partly motivated by a desire to force the West, and particularly the US, to provide a security guarantee in the form of extended deterrence similar to Washington's guarantee of North Atlantic Treaty Organisation (NATO) members' security. During the 1950s and 1960s, Pretoria was determined to enter into a defence alliance and to draw the Western powers into a commitment to ensure South Africa's security. Pretoria hoped to use the nuclear option to promote cooperation with the US, or possibly even some sort of military alliance. By the late 1970s, however, South Africa realised that no Western country was prepared to enter into any form of alliance. South Africa fell outside of the core strategic interests of any major Western state and thus nuclear posturing could not extract a security guarantee.

In 1976, the London-based Strategic Survey suggested that South Africa was pursuing an ambiguous nuclear strategy in order to obtain conventional arms supplies from the West. According to this suggestion, South Africa would agree not to pursue the nuclear option in exchange for assured conventional weapons supplies. (Pakistan used this approach very effectively after India's nuclear test in 1974. The US was committed to supplying Pakistan with advanced conventional weapons in an effort to persuade Pakistan to drop the nuclear option.)[15] However, the ambiguous nuclear strategy did not open doors to Western conventional weapon supplies for South Africa.

Many specialists have stressed that nuclear

weapons provide increased international status. There is strong evidence to suggest that South Africa adhered to an ambiguous nuclear weapons policy partly in order to promote itself as a "regional superpower". Throughout the many years of negotiation on the South West African issue, South Africa called on the West to respect the Republic as their ally and the principal regional power. Soon after the failure of Third World countries to have South Africa expelled from the IAEA, President PW Botha argued that there was no hope for the Southern African region unless Western powers cooperated with South Africa and accepted South Africa as "the regional power."[16] In South Africa during the 1980s, it was widely argued that the possession of nuclear weapons provided diplomatic leverage when dealing with both friends and foes. The nuclear option was seen as a means of encouraging the West not to abandon South Africa nor to impose a total economic embargo, as this could encourage Pretoria to exercise its nuclear capability.

Available evidence suggests that the isolation of South Africa – beginning in the 1960s and intensifying significantly in the 1970s and 1980s – prompted the nuclear programme as a way of "buttressing white morale" in the face of growing international pressure. Pretoria's image as a potential nuclear power was seen to enhance the government's ability to counter both external and internal opponents.

Official statements suggest that one of the key motivations for South Africa's nuclear programme was a desire to deter regional and extra-regional opponents. According to former President F W de Klerk, South Africa's so-called "bomb in the basement" was designed to deter South Africa's opponents, principally the former USSR. If South Africa had been threatened by a major Soviet backed conventional offensive, Pretoria would have threatened to test a nuclear device in order to pressure the US into intervening in the conflict. What De Klerk described as "a confidential indication of the deterrent capability . . . to one or more of the major powers, for example the United States, in an attempt to persuade them to intervene".[17] Thus a form of nuclear blackmail, or "catalytic deterrent", would be used to obtain a security guarantee in return for non-testing and non-use. If the US ignored South Africa's threat, a nuclear test would have been conducted in an attempt to deter an escalation of regional conflict. The Kalahari underground nuclear test site was prepared in 1977 to enhance the policy. According to a former senior official of the Atomic Energy Corporation, Waldo Stampf, no actual combat use for nuclear weapons was ever contemplated, nor were any specific targets identified, as the political leadership were well aware that use of a nuclear device would result in significant international economic, political and possibly military retaliation.

A major review of the nuclear programme in 1985 led to a presidential decision that the nuclear stockpile would be limited to seven bombs (only six were manufactured), confirming that the political leadership had realised that there was no use for this extremely costly and unusable instrument.[18] As the political leadership came to their senses they were able to put the brakes on the nuclear scientists who were keen to develop smaller weapons and launch a new wave of nuclear research. President F W de Klerk's succession to the office of President in September 1989 soon led to a second major review of the nuclear programme. Within two months, De Klerk ordered the complete dismantling and destruction of South Africa's nuclear weapons along with technical design and manufacturing information. The dismantling process was completed by the end of June 1991 and five months later the first inspection team from the IAEA arrived in South Africa to confirm the end of South Africa's nuclear weapons programme.

2.1 The lessons of South Africa's nuclear experience

The lessons of South Africa's nuclear programme and the decision to opt for denuclearisation provide some insight into the motives for weapons production and the reasons for a change of policy, which has relevance for the NWS and potential nuclear states.

- The scientific community played a vital role in promoting the weapons programme. The ability to produce nuclear weapons resulted in an almost irresistible temptation to proceed.
- South Africa's international isolation promoted the development of nuclear weapons.
- Efforts to extract security guarantees through nuclear blackmail were unsuccessful.
- South Africa's nuclear programme was not

effective in convincing Western states to provide conventional weapons.
- The nuclear threat did not enhance South Africa's international status and may in fact have contributed to strengthening the perception of it being a "rogue" state.
- South Africa gained little diplomatic leverage from the nuclear option – the country remained isolated in the international community under increasingly stringent economic sanctions.
- The policy of "catalytic deterrence" was at best naive, and at worst foolish – the US repeatedly made it clear that it had no intention of any direct military intervention on behalf of South Africa.
- The nuclear option did not improve South Africa's security which steadily deteriorated throughout the 1970s and 1980s as a consequence of growing domestic and international opposition to apartheid.
- By their own admission, South Africa's policy makers were unable to identify any target or actual use for nuclear weapons, other than political gamesmanship which could have been conducted without actually producing the weapons. The nuclear weapons were never actually integrated into the country's military forces.[19]
- The enormous cost of the nuclear programme and the escalating expenses associated with maintaining and upgrading a nuclear weapons stockpile became unmanageable.

In the end, the nuclear programme consumed an enormous amount of sate funding totalling approximately $5 billion. The real figure is probably double, if secret defence funds and the overall nuclear research and enrichment programme is included.[20]

The message from South Africa for all other small nuclear weapons states, or would-be states, should be clear – nuclear weapons are costly, politically ineffective, diplomatically of marginal importance and unlikely to improve security. It is therefore not surprising that within eight weeks of President P W Botha's fall from power, F W de Klerk ordered the complete cancellation of the nuclear weapons programme.

In effect, De Klerk acknowledged that nuclear weapons were extremely expensive, unusable and an impediment to South Africa's full participation in the international system.

3. SOUTH AFRICA'S POST-1994 NON-PROLIFERATION POLICY

In a Cabinet decision of 31 August 1994 the South African government confirmed its commitment to a policy of non-proliferation and arms control, opening a new chapter in South Africa's nuclear history.[21] At the same time, it was emphasised that a primary goal of policy is to reinforce and promote South Africa as a responsible producer, possessor and trader of advanced nuclear technologies. This policy is intended to promote the benefits of non-proliferation and arms control for African countries and members of the Non-Aligned Movement (NAM). The 31 August Cabinet decision authorised the Department of Foreign Affairs to advance South Africa as "an active participant in the various non-proliferation regimes and suppliers groups"; to actively support nuclear non-proliferation and to influence African states and NAM members to support non-proliferation while ensuring that access to advanced technologies are not denied to developing states.[22] As the only country in Africa and the NAM which is an active member of the suppliers groups, South Africa is able to serve as an important diplomatic link between NWS and the non-NWS.

The role of diplomatic bridge-builder was clearly demonstrated at the 1995 NPT Review and Extension Conference where South Africa played a leading role in securing a compromise between the NAM and the NWS. In his statement to the conference, Foreign Minister Nzo emphasised that the "NPT remains the only international instrument on nuclear disarmament to which all five nuclear weapon states are bound". Thus the NPT placed an ongoing commitment on the NWS to disarm. Moreover, Nzo argued that the "inequalities inherent in the treaty" as well as the criticisms with regard to disarmament, peaceful uses of nuclear energy and security guarantees should be delinked from the debate in order not to threaten the NPT itself. Moreover, as there was no official NAM position, South Africa took the lead in arguing that the NPT "should not be placed in jeopardy" by anything other than a permanent extension.[23] Nzo came out strongly in favour of the NPT arguing that "South Africa took the decision to destroy its nuclear weapons and to become a state party to the NPT because we saw our security being guaranteed by its provi-

sions. It is for this reason also that South Africa has become an active sponsor of an African nuclear weapons free zone treaty, which will be indefinite."[24]

South Africa thus strongly supported the indefinite extension of the treaty on the basis of putting into operation a set of "checks and balances" to ensure adherence by all signatories. During the 1995 conference, South Africa came up with what the chairperson, Sri Lanka's Jayantha Dhanapala, described as a "brilliant package" which bridged the gap between the NWS and the non-NWS. The South African proposal suggested that in return for a permanent renewal of the NPT, the NWS would agree to strengthen the monitoring on how the treaty was being observed with annual reviews; the implementation of a comprehensive ban on nuclear testing by the end of 1996; and a commitment by the NWS to eventually eliminate all nuclear weapons. This "consensus package" based largely on the South African proposal, served to strengthen support among NAM members for the NPT. Soon after the conference, the South African delegation was accused of acting as a US pawn in supporting the indefinite extension of the NPT. Before the NPT Review Conference, however, South Africa had in fact pressured the US in to supporting Pretoria's membership of the Nuclear Suppliers' Group (NSG). Moreover, Pretoria's support for the NPT was based on clear principles which the ANC had long advocated during years of exile.

South Africa's proposal entitled "Principles of Nuclear Non-Proliferation and Disarmament" contained the following elements:

- a restatement of all NPT signatories to the non-proliferation of nuclear weapons
- strengthening and full adherence to IAEA safeguards agreements
- access to nuclear material and technology for peaceful purposes
- progress on the fissile material cut-off negotiation
- progress on the reduction of nuclear arsenals
- progress on the conclusion of a Comprehensive Nuclear Test Ban Treaty
- commitment to the establishment of regional nuclear weapon free zones
- security guarantees for non-NWS.[25]

Along with the detailed proposal, South Africa called for the establishment of an ongoing review system meeting at fixed intervals and tasked with considering specific ways on how to strengthen adherence to the NPT. Consequently, South Africa was widely congratulated on having a clear disarmament vision and a detailed implementation plan.[26]

According to Jayantha Dhanapala, Foreign Minister Nzo's statement in the general debate was one of the "defining moments" of the NPT conference. Nzo's suggestions with regard to providing a yardstick with which to measure the implementation of the NPT as well as a strengthened review process were convincing to other signatories and provided the "building blocks for the agreement that was finally reached".[27] The US endorsed the South African approach indicating Washington's intention to seek a compromise. South Africa's proposal was widely considered to be extremely important as Pretoria spoke with moral authority, being the only state to unilaterally abandon the nuclear option. A number of NAM members were unhappy with South Africa's support for indefinite extension, but recognised the value of Pretoria's contribution. Dhanapala organised a group of 20 delegations to develop the South African proposals on strengthening the review process and suggestions on disarmament. The South African team took the lead in developing the "disarmament principles" proposal which involved 11 preliminary drafts. The final document accepted by the conference, included only minimal changes to the submission by South Africa.

The outcome of the conference produced three important decisions along with the agreement of participants to extend the treaty indefinitely. The first two decisions were based largely on South Africa's suggestions, ie. a decision to strengthen the NPT review process via regular review conferences; the adoption of a set of "principles and objectives on nuclear non-proliferation and disarmament" and lastly a "Resolution on the Middle East" encouraging all states in the region to establish a Middle East Nuclear Free Zone. The second decision contained a commitment by NPT signatories to a:

- verifiable CTBT
- ban on the production of fissile material for nuclear weapons
- reduction of nuclear weapons
- expansion of nuclear free zones
- security assurances
- strengthening of the IAEA safeguards system

- reaffirmation on the peaceful uses of nuclear energy.

Many NAM members were concerned about the lack of progress by the NWS in fulfilling their obligation to nuclear disarmament in terms of Article VI of the NPT. In terms of Article VI :

> "Each of the parties to the Treaty undertakes to pursue negotiations in good faith on effective measures relating to cessation of the nuclear arms race at an early date and to nuclear disarmament, and on a treaty on general and complete disarmament under strict and effective international control" (NPT, Article VI).

Some non-aligned states have adopted what has become known as a "maximilist" approach to the NPT, arguing that Article VI was originally intended to encourage the NWS to undertake comprehensive disarmament as a *quid pro quo* for the non-NWS acceptance of obligations outlined in Article II. The "minimalist" response of the NWS was based on the suggestion that general and complete disarmament includes conventional weapons and refers to all NPT signatories and not only NWS.

According to NAM representatives, the NWS had not made sufficient progress towards completing the arms control agenda which was outlined in 1968 and which was at the time a major encouragement to non-NWS. It was widely believed that the next important step towards nuclear disarmament would be the early conclusion of the CTBT followed by the FMCT. In order to pressure the NWS to fulfil treaty obligations it was argued that indefinite extension of the NPT was not the favoured option. At the end of the day, however, faced with NWS pressure and encouraged by South Africa's compromise option, NAM countries agreed to go along with indefinite extension. Nevertheless, Article VI was elevated to the head of the NPT agenda and will remain the key issue of debate for the foreseeable future.[28]

Failure to make significant progress towards nuclear disarmament contravenes the NPT and undermines the balance between the mutual obligations and responsibilities of NWS and non-NWS. For many NAM members, the NPT is not simply intended to halt the horizontal proliferation of nuclear weapons, it is also intended to stop vertical proliferation with the long-term objective of the complete elimination of nuclear weapons. Failure on the part of NWS to implement Article VI has promoted a culture of mistrust among non-aligned members, reinforcing their belief that the NPT is being used by the nuclear haves to permanently disadvantage the have nots. The 1995 Review and Extension Conference transformed the NPT from an East–West issue to a North–South issue. Strong support for indefinite extension came from the industrialised nations, mainly the Organisation for Security and Cooperation in Europe (OSCE) and Western allies. The majority of non-NWS in the NAM were, however, undecided on the issue of extending the NPT, which was regarded as inherently discriminatory.[29]

The position of the NAM on the NPT disarmament clause has been fairly consistent. NAM members presented similar arguments at the Non-Aligned Ministerial Conference in Cairo during June 1994, at the third session of the Preparatory Committee of the 1995 NPT Review and Extension Conference, the non-aligned meeting in New York shortly before the conference began, as well as at the Bandung meeting during April 1995. The key elements of their collective position on the NPT was the need for a CTBT and a fissile material cut-off agreement as well as for credible security assurances.[30] As a consequence of proposing the diplomatic compromise at the 1995 conference, South Africa emerged as a leader of the NAM and a leading player in the field of arms control and disarmament. Jayantha Dhanapala pointed out that South Africa's "moral stature by virtue of having destroyed its nuclear weapons, (gave) it tremendous influence".[31]

Following the review conference, the NAM Coordinating Bureau meeting in New York established a new Standing Committee on Disarmament chaired by Indonesia, and tasked with monitoring the implementation of the NPT and the 1995 NPT conference commitments. The strengthened review process promised greater accountability and confidence that treaty undertakings would be fulfilled. Moreover, it was argued that NAM members would in future respond forcefully if NPT undertakings were disregarded. However, since 1995 the NAM has failed to speak with one voice on the NPT, and the organisation has had limited impact on influencing the NWS to fulfil their treaty obligations. Moreover, there remain dif-

ferences within the NAM between maximalists and minimalists over the interpretation of treaty obligations.

Despite South Africa's limited international experience in multilateral fora, the diplomatic momentum of the 1995 conference was maintained at the subsequent NPT preparatory committee (PrepComs) meetings in 1997, 1998 and 1999. The PrepComs became an important part of the review process as they focus on how the NPT has been implemented by discussing principles, objectives and ways to promote full implementation of the treaty, with the objective of forwarding recommendations on these issues to the 2000 Review Conference. On the issue of the role of the PrepComs, two views have dominated thinking among participants. Some view the role of the PrepComs narrowly, suggesting that they should not be transformed from a preparatory committee into a decision making forum. A more liberal view interprets the PrepCom mandate more broadly, suggesting a role for reviewing NPT implementation and the consideration of new principles and objectives designed to achieve the aims of the treaty.[32] South Africa has tended to take a more liberal approach, seeing the PrepComs as a major opportunity to promote the goals of the NPT.

In 1997, South Africa again played an important role in promoting the agreements reached at the 1995 NPT Review and Extension Conference. South Africa's proposal on Security Assurances was widely supported by NAM members and was identified as the focus for extensive debate in the 1997 PrepCom. In 1997, South Africa achieved a significant breakthrough in obtaining conference agreement for a specific time allocation to discuss security issues, thereby preventing the NWS's continued dominance of the NPT agenda and conference procedure.[33] At the 1998 PrepCom, South Africa proposed a discussion on nuclear disarmament as a special topic. The idea was, however, met with strong opposition by the US.[34]

South Africa's diplomatic role in promoting nuclear disarmament has been supported by strong encouragement at the highest level. South Africa's political leadership has argued against the continued deployment of nuclear weapons and would agree with the Canadian anti-nuclear campaigner Douglas Roche, that during the Cold War "it was an outrageous violation of the human rights of every person in the world for two states to terrorise each other with threats of mutual destruction".[35] Moreover, as Muchkund Dubey has stressed, "it is morally indefensible to force mankind to live with the means of its own destruction".[36]

4. THE 2000 NPT REVIEW CONFERENCE AND BEYOND

South Africa's diplomatic approach since 1995 has been to advance the "Principle and Objectives for Nuclear Non-Proliferation and Disarmament" agreed to at the Extension and Review Conference by seeking allies, both inside and outside the NAM, to support reasonable and practical suggestions. South Africa has sought to mobilise as much support as possible for an evolutionary and carefully measured approach towards nuclear disarmament. A key element of the diplomatic campaign has been to separate the NWS and their allies, by convincing the allies to support resolutions aimed at long-term global nuclear disarmament. This has manifested itself in the growing influence of the New Agenda Coalition comprising Ireland, Sweden, New Zealand, Brazil, Mexico, Slovenia, Sweden and South Africa. Behind the scenes, South Africa has played a decisive role in the New Agenda Coalition, drafting proposals that are widely respected and accepted, while avoiding the "all or nothing" rhetoric which usually polarises the nuclear debate.

The New Agenda Coalition's proposed UN resolution of December 1998 received 114 votes in favour, and despite significant pressure from the US, Britain, France and Japan, 12 of the 16 NATO counties abstained, refusing to oppose the resolution. Strong opposition and votes against the resolution came mainly from the nuclear weapon states, ie. the US, Britain, France, Russia, India, Israel and Pakistan. The New Agenda Coalition's resolution called for the full implementation of the decisions adopted at the 1995 NPT conference. The debate on the resolution provoked a heated exchange on NATO's continued reliance on a nuclear first use strategy. Last year, the South African delegation at the Conference on Disarmament in Geneva attempted to promote nuclear disarmament by proposing the establishment of a committee to "deliberate on practical steps for systematic and progressive efforts to eliminate nuclear weapons". According to a member of

the South African delegation, Peter Goosen, Pretoria saw "nuclear disarmament as the concern of the entire international community" and the proposal was meant to avoid "further polarisation" between the NWS and the non-NWS. [37] South Africa's suggestion was motivated by the stalemate surrounding the failure to ratify and implement the START II agreement.

Since 1998, South Africa has been a leading member of the New Agenda Coalition which has proposed a new detailed agenda aimed at achieving a nuclear-free world. The New Agenda Coalition has attempted to move the nuclear disarmament debate towards middle ground, by proposing the implementation of a number of measures – both short-term and long-term – intended to jump start the nuclear disarmament process. The New Agenda Coalition's strategy is designed to promote a step-by-step approach without time limits, and is intended to emphasise achievable objectives. South Africa's 1998 proposal to promote nuclear disarmament drew widespread support because it was practical and could be accommodated within the NPT process. South Africa called on the NWS to honour three of the 1995 undertakings: implement the CTBT; ban the production of fissile material; and make "systematic and progressive efforts" to reduce nuclear arsenals. With the CTBT and FMCT under discussion, South Africa proposed a concentration on "deliberate and practical steps" towards nuclear disarmament. However, the NWS – led by the US – refused to discuss the proposal. The New Agenda Coalition was motivated by the need to break the nuclear disarmament deadlock and to encourage the NWS to implement undertakings made at the 1995 NPT Review and Extension Conference.

Three NPT Review preparatory committee meetings have been held since the 1995 Extension and Review Conference. The first PrepCom formulated comments and proposals for inclusion into a final declaration, but instead decided to forward the document as "feed material" for the Review Conference. PrepCom II, meeting in 1998, tried to consolidate the work of the previous year, but was unable to produce a final document. The third PrepCom resolved procedural issues, but failed to produce a detailed proposal for the 2000 Review Conference. The PrepComs have thus not produced substantial recommendations which could be placed before the Review Conference. The Prep Comms have discussed substantive issues, but have been unable to decide on them and have thus fallen victim to the "pragmatists" who see the PrepComs as unable to make substantive recommendations, as opposed to the "perfectionists" who see the formulation of specific recommendations as the key task of the PrepComs in terms of the 1995 NPT Extension and Review Conference documents.[38]

4.1 The non-proliferation "yardsticks"

The 1995 NPT Review and Extension Conference agreed to seven key "yardsticks," or means of measuring the implementation of the NPT. The 2000 Review Conference will be required to assess the success of implementation. The yardsticks include:

- Implementation of the CTBT. The treaty has been concluded, but without a number of key ratifications, especially that of the US, it cannot be implemented.
- Completion of a fissile material production ban. The FMCT remains deadlocked with disagreements over the exact quantity of fissile material in the different NWS. (The promotion of a FMCT is designed to develop a so-called "strategy of suffocation" – preventing both horizontal and vertical proliferation by preventing the production and stockpiling of nuclear materials [highly enriched uranium and plutonium]. Moreover, any international agreement on nuclear disarmament would be impossible if unsafeguarded fissile material production were not prevented. For success, adequate verification procedures need to be implemented in all fissile production and enrichment facilities not currently subject to international monitoring. The US [1992], Russia [1994], Britain [1995] and France [1996] have all terminated the production of plutonium for weapons production.)[39]
- Development of nuclear weapons free zones in the Middle East and other regions of tension. A Middle East Nuclear Weapons Free Zone is unlikely without a lasting settlement to the Arab-Israeli dispute.
- Establishment of additional security assurances for non-nuclear states – providing credible nuclear guarantees remain problematic.
- Regular assessment and evaluation of IAEA safeguard agreements – over 50 states have not yet concluded safeguard agreements.

- Provision of sufficient financial and human resources for the IAEA – far more resources are required.
- Determined pursuit by the nuclear powers to reduce and ultimately eliminate nuclear weapons – most NPT signatories would agree that progress in this area has been inadequate.

It is now widely argued that the past five years since the 1995 Review Conference have not seen significant progress towards the fulfilment of NPT undertakings. Moreover, related factors are also likely to have a negative impact on the 2000 Review Conference. These factors include:

- A deadlock on Russian–US arms control negotiations, which according to some observers suggest that "prospects for genuine nuclear disarmament are now far worse than a decade ago".[40] The Russian Duma has failed to ratify the START II agreement, despite former President Yeltsin's repeated requests. The serious delay in the implementation of START II has led to a failure to begin substantive discussions on START III. On 9 April 1997 the State Duma postponed indefinitely the decision to ratify START II. (Russian opposition to START has been motivated by the strong opposition to NATO's eastward expansion and concern that implementation of START II will require the replacement of existing multiple independently targetable re-entry vehicled intercontinental ballistic missiles [ICBMs] with several hundred single warhead ICBMs in order to maintain nuclear parity with the US.)
- NATO's new Strategic Concept, released in April 1999, confirms the alliance's commitment to maintain the option of a first use of nuclear weapons. At the same time, NATO's bombing of Yugoslavia without the approval of the UN Security Council has undermined the West's relations with Russia, frustrating cooperation on arms control.
- India and Pakistan's nuclear tests gave them both overt nuclear weapon status, but at the same time directly undermined the non-proliferation regime established by the NPT.[41]
- Political developments in Russia relating to conflict in Chechnya and the US Presidential election scheduled for later this year suggests that there will be little or no progress on bilateral nuclear disarmament over the short-term.
- Evidence of US determination to deploy anti-ballistic missile (ABM) systems. The Ballistic Missile Defence Organisation (BMDO) is seeking $4.5 billion for research, development, testing and evaluation of missile defence systems.[42] According to recent reports, the Clinton Administration has promised a deployment decision as early as July this year. Both houses of Congress have already voted to deploy missile defences as soon as technologically possible.
- Apparent efforts by some non-NWS such as Iran to obtain nuclear weapons material and technology.
- The continued dominance of pro-nuclear elements within the US defence establishment who in 1997 convinced President Clinton to sign a new nuclear directive to accommodate their perspective.[43] The Defence Science Board's study of 1998 concluded that the US would need to maintain a significant nuclear force until 2010 and beyond. This conclusion was supported by a major study conducted jointly by the National Defence University and Livermore Laboratories. Both studies asserted the continued importance of nuclear deterrence and the need to maintain an effective nuclear capability. The "stockpile stewardship" programme is intended to maintain and when needed upgrade US nuclear weapons for the next 10 years.[44] According to independent assessments, a 1998 leaked Presidential Decision Directive (PDD) requires the retention of a robust US nuclear capability for the foreseeable future.[45] This has led some observers to suggest that the US has given up on arms control and has decided that nuclear deterrence must be maintained.[46]
- Compliance with NPT safeguards obligations in parts of North Korea and Iraq remain uncertain.

Although there are a number of issues which are likely to impede success at the 2000 Review Conference, nuclear disarmament is expected to be high on the NAM's agenda.

4.2 Nuclear disarmament

In 1962 US President John F Kennedy suggested that "every man, woman and child lives under a nuclear sword of Damocles, hanging by the slenderest of threads, capable of being cut at any moment by accident or miscalculation or by madness. The weapons of war must be abol-

ished before they abolish us".[47] President Kennedy's words are as true today as they were almost 40 years ago. In addition to the threat of nuclear destruction, it is now widely contended, especially by NAM members, that over the long-term, nuclear non-proliferation can be sustained only if complemented by nuclear disarmament. Without meaningful nuclear disarmament, the horizontal proliferation of nuclear weapons, irrespective of the NPT, remains a serious risk and is likely to become more urgent as increasing numbers of developing countries acquire the technology needed to produce nuclear weapons.[48]

In recent years a number of carefully considered and detailed studies have been offered as a path towards total nuclear disarmament. These include the Henry L Stimson Centres' Second Report of the Steering Committee Project on Eliminating Weapons of Mass Destruction; Report of the US-Japan Study Group on Arms Control and Non-Proliferation After the Cold War; National Academy of Sciences' report on The Future of United States' Nuclear Weapons Policy; the Canberra Commission on the Elimination of Nuclear Weapons; the Tokyo Forum's Facing Nuclear Danger; the Committee on Nuclear Policy's Jump-START: Retaking the Initiative to Reduce Post-Cold War Nuclear Dangers; and the 1999 Report by the Committee on Nuclear Policy (Stimson Centre).

The various disarmament studies broadly support the contention of the Canberra Report calling for the elimination of nuclear weapons based on three main propositions: the destructive power of nuclear weapons robs them of any military utility and renders them politically and morally indefensible; nuclear weapons cannot be retained in perpetuity and never used either on purpose, or by mistake; their possession by some countries is a major incentive for others to acquire nuclear weapons. The disarmament proposals have been supported by an International Court of Justice (ICJ) decision ruling that the use of nuclear weapons is unlawful and goes against the principles of humanitarian law.[49]

A number of retired military officers have also come out in favour of total nuclear disarmament. Former head of the US Strategic Command General Lee Butler has contended that nuclear disarmament is a "moral imperative". According to Butler, "accepting nuclear weapons as the ultimate arbiter of conflict condemns the world to live under a dark cloud of perpetual anxiety".[50] The studies on the future of nuclear weapons reach basically the same conclusions: nuclear weapons are unusable, immoral, illegal and totally unacceptable as an element of security policy. There is no moral, or legal argument which can justify the continued possession of nuclear weapons by some countries and not by others. Moreover, horizontal proliferation cannot be stopped without terminating vertical proliferation.

The proposals to promote total nuclear disarmament appear, however, to enjoy only limited support within defence decision-making circles of the NWS where they tend to be regarded as unrealistic and utopian. Furthermore, all of the proposals for nuclear disarmament are based on the premise that the end of the Cold War has created conditions that will facilitate the rapid reduction and elimination of nuclear weapons.[51] During the early 1980s, the Harvard Nuclear Study Group conducted a major investigation into the role and future of nuclear weapons. It concluded that it was simply "atomic escapism" to suggest that one day nuclear weapons would disappear. In their opinion, nuclear weapons could not be abolished, thus "mankind must learn to live with them". Their central thesis was that nuclear weapons had been invented and the knowledge to manufacture could not be lost – they could not be disinvented.[52]

The debate on the future of nuclear weapons has produced three main schools of thought:

- *The Optimists:* Nuclear weapons can be eliminated over the next few years in the same way that chemical and biological weapons were banned.[53]
- *The Pessimists:* Nuclear disarmament will remain an elusive goal, while the NWS continue to rely on nuclear weapons for defence, other threshold states will cross the barrier to join the nuclear club, gradually undermining the NPT and the whole nuclear non-proliferation regime. Leading "disarmament pessimist" Michael Quinlain suggests that nuclear disarmament does not form part of a "realistic agenda" since it will be politically and physically impossible for several decades to come. He contends that nuclear abolition is an admirable "long term aspiration" to keep

in mind, "but it is not in practical terms a sensible policy goal now."[54]

- *The Realistic Optimists:* There have been steps towards nuclear disarmament over the past decade and that process is likely to continue. But progress towards total nuclear disarmament will be slow and the final goal may not be achievable. In the long-term, the world may have to settle for "virtual nuclear" arsenals in the hands of the existing nuclear states; that is, a small number of dismantled nuclear weapons stored separately, and some distance, from delivery vehicles.

Under present conditions in the international system, the "realistic optimists" appear to present the most convincing argument. More time is needed to build a post–Cold War international system based on trust and mutual confidence. Greater effort needs to be directed at confidence building measures, cooperative threat reduction and conflict prevention. Global conventional disarmament also needs to be accelerated with a view to supporting diplomatic solutions to international, and national, disagreements rather than relying on the use of force. In other words, an appropriate environment needs to be established before further and significant denuclearisation can occur.

CONCLUSION: A COMPROMISE FOR THE 2000 NPT REVIEW CONFERENCE?

The 2000 Review Conference will be called on to propose a way to ensure the full implementation of the NPT and the undertakings made in 1995. The pre-conference scholarly debate has suggested three options for the way forward:

- *Restructure the NPT regime:* Some commentators believe the entire NPT system has failed and needs to be restructured.[55] This will require a major redrafting of the NPT itself and a rethink on the PrepCom system.
- *A "peasant's revolt":* Frank Blackaby has suggested that the non-NWS should issue a warning to the NWS demanding that within two years, undertakings made at the 1995 conference are fulfilled.[56] Failing which, non-NWS will withdraw en masse from the NPT. The threat of a "peasant's revolt" would be intended to force the NWS to implement a comprehensive disarmament programme.
- *Compromise:* This implies finding a way to renew confidence in the NPT, despite present difficulties, and strengthen the non-proliferation regime where possible.

Many commentators are predicting serious disagreements at the 2000 NPT Review Conference, mainly on the grounds that the NWS have not done enough to reduce their nuclear weapon stockpiles in terms of Article VI of the NPT. Fulfilment of the other yardsticks have also not been impressive and are expected to elicit strong criticism from conference attendees. Once again the NPT is endangered and once again a state, or group of states, needs to propose a reasonable compromise which will prop up the NPT for another five years and restore confidence in the nuclear non-proliferation regime as a whole.

In 1995 Foreign Minister Nzo urged that the NPT "should not be placed in jeopardy" and therefore agreed to support permanent extension. South Africa needs to seek an acceptable compromise to ensure that the NPT is not placed in jeopardy at the 2000 Review Conference. The non-proliferation regime depends on the broad consensus of all participants. Despite the fact that progress on implementing the 1995 undertakings has not been sufficient, the 2000 Review Conference needs to build a consensus on the argument that the NPT remains the key to nuclear disarmament over the longer term.

One of the central questions is how to encourage the NWS to implement past disarmament undertakings. The NWS appear to be unmoved by past criticisms and constantly ignore UN resolutions admonishing them to implement agreements. (Since the establishment of the UN, the General Assembly has regularly passed resolutions calling for nuclear disarmament.) South Africa increasingly argues in favour of mobilising the support of allies of the NWS, especially NATO members, for the resolutions of the New Coalition Agenda. The NWS have been dismissive of NAM criticism, but are likely to be more responsive to the criticism of NATO members.[57]

Besides reiterating the need to fulfil undertakings agreed to at the 1995 Conference, a compromise for the 2000 Review Conference could include:

- Increased involvement of the NAM in nuclear disarmament. The NAM has a long history of opposition to nuclear weapons and should be mobilised for more active partici-

pation in the global disarmament debate.[58] This will ensure broader NAM acceptance of the NPT, despite the treaty's inherent weaknesses. (This should include increased transparency of nuclear suppliers groups and a greater sharing of information on peaceful nuclear technology.)

- An increased role for non-governmental organisations (NGOs), especially in NAM countries. The NGO non-proliferation network within NAM countries should be enhanced in support of the larger more complex networks in the North. NGOs can propose new ideas and debate issues more broadly, providing practical suggestions for security professionals and policy makers.[59] The role of NGOs as international pressure groups needs to be enhanced in order to provide a more effective voice for nuclear disarmament.
- Accepting that nuclear disarmament for the medium term is essentially a bilateral process between Russia and the US, the 2000 Review Conference should adopt a more focused approach, concentrating on achievable outcomes. Russian and US implementation of the START agreements would have a significant positive impact on the nuclear non-proliferation regime. The Conference should thus request an undertaking from Russia and the US that the terms of the START I agreement will be fulfilled as promised by 5 December 2001. A convincing mechanism for a representative group of NPT signatories to verify START I undertakings should also be established.[60]
- Request an undertaking from Russia and the US to stick to bilateral nuclear disarmament in terms of the START II agreement (3500 deployed strategic warheads) with NPT signatory verification of fulfilment by 31 December 2007. (At the Helsinki Summit during March 1997, Presidents Clinton and Yeltsin both agreed to extend the implementation time for START II and to commence negotiations on START III with a proposed limit of 2500 strategic warheads.)
- Call for the removal of 10% of nuclear weapons from alert status per year – to be completed by the 2010 NPT review conference. De-alerting nuclear weapons has been opposed in the past, but gradual change could be an acceptable compromise.
- Propose a START IV treaty, with the objective of limiting Russia and the US to 1000 virtual nuclear weapons each, thereby shifting the emphasis from unrealistic demands for total nuclear disarmament which are counterproductive. In the long-term, complete nuclear disarmament is not impossible, but unlikely. (Any state with a secret nuclear programme could emerge as a major military power able to exercise nuclear blackmail over disarmed former NWS, or other, states.) The best hope is for "virtual nuclear arsenals" which implies the prohibition of assembled, ready-to-use nuclear weapons. Virtual nuclear weapons would mean a separation of warheads from delivery vehicles requiring a significant period of time and easily detected assembly for use. Virtual nuclear weapons would marginalise the role of nuclear weapons in global politics, eliminate the possibility of accidental or unauthorised launch, while reinforcing the non-proliferation regime.[61]
- Establish an ongoing dialogue between NGOs and uniformed military personnel in the NWS. The military have traditionally been the strongest opponents of arms control and disarmament. Debate with political leaders and civilian officials continues to have limited impact on defence planning in the NWS. Cold War era defence planners need to be involved in the dialogue on nuclear disarmament and need to be encouraged to develop defence strategies which exclude nuclear weapons. (Former US arms control negotiator Paul Nitze has suggested that the Pentagon should consider shifting its reliance on nuclear weapons to deterrence, based on smart conventional capability.)[62]
- Promote a global denuclearisation environment by enhancing the conditions for nuclear disarmament through limiting arms trade of conventional weapons, and seeking ways to deinstitutionalise war. This could be advanced via regional forums designed to promote trust and confidence building; increased dialogue between armed forces of different nations and the significant reduction in international arms trade.[63] This process should have as a long-term aim the delegitimising of nuclear weapons.

The long-term future of the NPT depends on the consensus of signatories. Without the support of NAM members, the NPT will gradually

be undermined. Signatories can at any time invoke their rights under Article X.1 of the NPT and withdraw from the treaty. Erosion of confidence in the NPT would have very serious consequences for the nuclear non-proliferation regime as a whole and could lead to widespread nuclear proliferation. South Africa can play a role in finding a compromise at the 2000 Review Conference, but should adopt a more focused approach in supporting the NPT. The New Agenda Coalition's proposals remain too ambitious and unrealistic under present conditions in the global strategic environment. The New Agenda Coalition's agenda should be less ambitious and more achievable. Whatever the outcome of the Review Conference, South Africa should at all times be guided by former Foreign Minister Nzo's belief that "security is provided by nuclear disarmament rather than by nuclear proliferation".

ENDNOTES

1) Alfred Nzo, quoted in Zamora Collina, "South Africa Bridges the Gap," *The Bulletin of the Atomic Scientists*, July/ August 1995, p.31. Foreign Minister Nzo explained that South Africa saw its "non-proliferation and arms control policy as being integral to our commitment to democracy, human rights, sustainable development, social justice and environmental protection ... It was in this context that South Africa turned away from the edge of the nuclear weapon abyss".
2) Konrad Adenauer Foundation (Germany); Institute for International Policy Studies (Japan); Belfer Centre for Science and International Affairs (USA), "Joint Proposal on Nuclear Non-Proliferation and Disarmament," *Asia Pacific Review*, Vol. 6, No. 1, 1999, pp. 1-6.
3) See Norachi Sinhaseni, "Nuclear Weapon Free Zones: Looking Ahead," *Disarmament*, Vol. XX, No.1, 1997, pp. 63-70. See also Jargalsaikhany Enkhsaikhan, "Nuclear Weapon Fee Zones: Prospects and Problems," *Disarmament*, Vol. XX, No. 1, 1997, pp. 71-83. Enkhsaikhan points out that NWFZs promote regional confidence building and disarmament. Five proposed future NWFZs are Central and South Asia, the Middle East, the Korean peninsula and Central/Eastern Europe.
4) Peter Van Ham, *Managing Non-Proliferation Regimes in the 1990s*, Council on Foreign Relations Press, New York, 1994, p. 11.
5) Michael Klare, *Rogue States and Nuclear Outlaws: America's Search for a New Foreign Policy*, Hill and Wang, New York, 1995, p. 26. See also Leonard Spector, "Neo-Nonproliferation," *Survival*, Vol. 37, No.1, 1995, pp. 66-85 and Galen Carpenter, "Closing the Nuclear Umbrella," *Foreign Affairs*, March/April, 1994, pp. 8-20.
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8) See T B Millar, "The Nuclear Non-Proliferation Treaty and Superpower Condominium," in C Holbraad (ed)., *Superpowers and World Order*, Australian National University Press, Canberra, 1971, p. 64.
9) Joeseph Rotblat, "The Foundations for a Strengthened Non-Proliferation Regime", in S Khan, (ed), *Nuclear War, Nuclear Proliferation and Their Consequences*, Proceedings of the Fifth International Colloquium organised by the Group De Bellerive, 7-9 June 1985, Geneva, Claredon Press, Oxford, 1986, p. 65.
10) See Caroline Thomas, *In Search of Security – The Third World in International Relations, Rienner, Colorado*, 1987, pp. 121-141.
11) Joseph Cirincione, *Evaluation of the NPT Review and Extension Conference*, May 1995, http://www.stimpson.org/campaign/aca.htm., p.3.
12) Stockholm Peace Research Institute, *Postures for Non-Proliferation*, Taylor and Francis, London, 1979, p. 75.
13) *Ibid.* See David Albright and Tom Zamora, "South Africa Flirts with the NPT," *The Bulletin of the Atomic Scientists*, January/February 1991, pp. 1-10.
14) Quoted in Cumming, D.: "Temptation to Make Own Bomb Was Irresistible," *Sunday Star*, Johannesburg, October 24, 1993. David Albright suggests that the weapons came out of South Africa's "can-do" mentality." See David Albright, "South Africa and the Affordable Bomb," *Bulletin of the Atomic Scientists*, Vol. 50, No. 4, 1994, p. 1.
15) See S Tahir-Kheli, "Pakistan's Nuclear Option and US Policy," *Orbis*, Summer, 1978. See also David Albright, "South Africa and the Affordable Bomb," *Bulletin of the Atomic Scientists*, July/August, 1994, pp.1-23.
16) *The Citizen*, Johannesburg, 10 November 1988.
17) Speech by President F W de Klerk, quoted in F W de Villiers, et.al., "Why South Africa Gave Up the Bomb," *Foreign Affairs*, Vol. 72, No. 5, 1993, p.98. See also David Albright, "South Africa Comes Clean," *Bulletin of the Atomic Scientists*, May 1993, pp. 3-5. See also Daryl Howlett and John Simpson, "Nuclearisation and Denuclearisation in South Africa," *Survival*, Vol. 35, 1993/94, pp. 155-173.
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24) Collina, *op.cit.*, p.5. See Zondi Masiza and Chris Landsberg, "Fission for Compliments? South Africa and the 1995 Extension of Nuclear Non-Proliferation," *Policy Issues and Actors*, Vol. 9, No. 3, Centre for Policy Studies, 1996.
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26) See Joseph, Cirincione, "Evaluation of the NPT Review and Extension Conference," *Campaign for the Non-Proliferation Treaty*, http://www.stimson.org/campaign/aca.htm.
27) Jayantha Dhanapala, "The 1995 Review and Extension Conference of the Nuclear Non-Proliferation Treaty," *Disarmament*, Vol. XVII, No. 3, 1995, p.8.
28) See Ambassador Jayantha Dhanapala and Ambassador Thomas Graham, "The Diplomatic Lessons Learned from the Renewal of the Treaty on the Non-Proliferation of Nuclear Weapons," *ISD Reports*, Georgetown University, http://sfswww.georgetown.edu.
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31) Quoted in Erlich, J. and Hitchens, T, "South Africa Shines as Policy Beacon", *Defence News*, 12-18 June 1995.
32) See Lawrence Scheinman, "The Strengthened Non-Proliferation Treaty Review Process and the 1999 Non-Proliferation Treaty Preparatory Committee," *Confidence Building and Conflict Reduction*, 12th Asia-Pacific Roundtable, Kuala Lumpur, 1998, pp. 1- 5.
33) Department of Foreign Affairs, *Multi-lateral Branch Annual Report*, 1997, DFA, Pretoria, 1998, p. 19.
34) Stanley Sheinbaum, "Its Time to Abolish Nuclear Arms," *New Perspectives Quarterly*, Vol. 15, No. 4, 1998, p.60.
35) Douglas Roche, *A Bargain for Humanity*, University of Alberta Press, Edmonton, 1993, p. 145.
36) Muchkun Dubey, "The Only Alternative is the Elimination of Nuclear Weapons," *Disarmament*, Vol. XVII, No. 2, 1994, p.80.
37) Quoted in Alison Clayton, "Deadlock on Disarmament," *Jane's Defence Weekly*, Vol. 31, No. 3, 1999, p.21.
38) See Ben Sanders, "Changes in the Security Environment, Regional Discord and Contention on the 1995 Agreements," *Disarmament Forum*, http://www.un.org/Depts/dpa/docs/cdahome.htm, p. 27.
39) See Hayat Khan, "The Fissile Material Cut-Off Treaty," *Disarmament*, Vol. XX, No. 1, 1997, pp. 41-51. Twenty countries operate nuclear reactors and produce spent fuels which could be reprocessed for the production of nuclear weapons. Five countries are presently engaged in commercial reprocessing: France, Britain, Russia, India and Japan. It has been estimated that Japan has 21 tons of separated plutonium that could be used in a weapons programme. The US presently uses two to four kilograms of weapon-grade plutonium per warhead. The world's estimated 260 tons of weapon-grade plutonium manufactured since 1945, translates into over 85 000 nuclear warheads. See Robert Noris and William Arkin, "Nuclear Notebook – World Plutonium Inventories, 1999," *The Bulletin of the Atomic Scientists*, Vol. 55, No. 5, 1999, p. 2. The FMCT has been plagued by arguments over whether stockpiles produced before the cut-off date should be included, or only future production, as well as the problem of adequate verification and difficulties with accounting for the production of fissile material. The ad hoc committee on FMCT was not re-established during the 1999 session of the CD. See Tariq Rauf, "Non-proliferation Regimes at Risk", *CNS Occasional Paper No. 3*, Monteray Institute of International Studies,1999.
40) Miguel Marin-Bosch, "Nuclear Disarmament, 1995-2000: Isn't It Pretty to Think So?" *Disarmament Forum*, http://www.un.org/Depts/dpa/docs/cdahomehtm, p. 13.
41) Following the Indian and Pakistani nuclear tests, Japanese diplomats are reported to have suggested that Tokyo had originally agreed to the NPT on the grounds that nuclear weapons would be limited "legitimately"to five powers. If the NPT framework was altered they warned that Japan may be forced to reconsider its NPT commitment. See Nayan Chanda, et.al, "The Race is On," *Far Eastern Economic Review*, June, 11, 1998, p. 21.

42) See "Ballistic Missile Defence Public Statements," US Department of Defence, www.acq.osd.mil/bmdo/bmdolink. China has indicated that it may revoke its no-first-use policy and accelerate its development of nuclear weapons if the US assists Taiwan in deploying a ballistic missile defence system. Dhanapala suggests that failure to reach agreement on the ABM Treaty could undermine all progress on arms control. Jayantha Dhanapala, "Reinforcing the NPT – International Workshop on the 2000 Conference", New York, 1 November 1999, Monteray Institute of International Studies. Washington's growing interest in revising the ABM Treaty has been fueled by concerns about the spread of weapons of mass destruction and ballistic missiles. The Rumsfeld Commission report suggested that the ballistic missile threat to the US is broader, more developed and evolving more rapidly than originally estimated and may emerge with little or no warning. The Taepo Dong-1 missile test by North Korea reinforced the findings of the Commission. See David Gompert and Jeffrey Isaacson, "Planning a Ballistic Missile Defence System of Systems: An Adaptive Strategy," Rand Corporation, November 1999, http://www.rand.org/publications/IP/IP181/. See also Andrew Koch, "BMDO Chief Details Plans to Spend an Additional $1 Billion," *Jane's Defence Weekly*, Vol. 33, No. 11, March 2000, p. 5.
43) William Arkin, "A New Idea for Reductions," *Bulletin of the Atomic Scientists*, Vol. 55, No. 1, 1999, p. 81.
44) Patrick McCormick, "The Bomb Doesn't Fall Far From the Tree," *US Catholic*, Vol. 63, No. 9, 1998, p. 47.
45) See Joseph Rotblat, "Nuclear Weapons for None or For All," *New Perspectives Quarterly*, Vol. 15, No. 4, 1998, pp. 17-19.
46) Partricia Lewis, "Facing Nuclear Dangers: An Action Plan for the 21st Century," *Disarmament Forum*, http://www.un.org/Depts/dpa/docs/cdahome.htm, p. 55.
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48) See Manpreet Sthi, "From Nuclear Non-Proliferation to Nuclear Disarmament: A Need to Refocus NPT Priorities," www.idsa-india.org/an-mar-5.html.
49) See George Lopez and Nancy Myers, *Peace and Security – The Next Generation*, Rowman & Littlefield, New York, 1997, pp.205-207.
50) Quoted in Robert Manning, "The Nuclear Age: The Next Chapter," *Foreign Policy*, Winter, 1997-98, p. 26.
51) See for example Joseph Cirincione, "New Initiatives Towards a World With Fewer Nuclear Weapons," *Disarmament*, Vol. XX, No.2, 1997, pp.18-31.
52) Carnesale, A, et.al, The Harvard Nuclear Study Group, *Living With Nuclear Weapons*, Harvard University Press, Cambridge, Mass., 1983, p. 19.
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54) Quoted in Manpreet Sethi, "Towards Making Nuclear Disarmament a Practical Proposition," www.idsa-india.org/an-jun8-8.html, p.5.
55) See Marin-Bosch, *op.cit.*, p. 19.
56) Frank Blackaby, quoted in Sharon Riggle, "Could the Non-Proliferation Treaty Collapse? The Uncertain Road Ahead," *Disarmament Forum*, http://www.un.org/Depts/dpa/docs/cdahome.htm, p. 32. The Acronym Institute suggests that the NPT could unravel completely if a few states decided to withdraw from the treaty. *Acronym Report*, No. 13, February 2000, http://www.acronym.org.uk/a13.
57) See Stephanie Fraser, "General and Complete Disarmament," *Women's International League for Peace and Freedom*, www.igc.org/disarm/ nptngo99p4.htm. pp.1 -10. See also Dave Knight, "Campaign for Nuclear Disarmament," *Ibid.* pp. 10 -12.
58) See Ramsesh Thakur, "Non-Compliance: Who Decides, What to Do," *Australian Journal of International Affairs*, Vol. 53, No. 1, 1999, p.74.
59) NGOs can play a positive role in nuclear

disarmament. Former President Jimmy Carter's Track II diplomacy, backed by a number of NGOs opened the way for a deal with North Korea in 1994 on the issue of Pyongyang's nuclear weapons programme. See Leon Sigal, *Disarming Nuclear Strangers*, Princeton University Press, New Jersey, 1998, p.8.

60) Verification is increasingly becoming a key component of arms control. See Patricia Lewis, "Verification in a Changing World," *Disarmament*, Vol. XVII, No. 2, 1994, pp. 108 -131. Lewis points out that if clandestine activities are to be detected, on-site inspections (OSI) have to be comprehensive and as intrusive as possible.

61) See Michael Mazzar, "Virtual Nuclear Arsenals," *Survival*, Vol. 37, No. 3, 1995. Mazzar contends that "virtual nuclear arsenals" are a more realistic alternative to total disarmament. His argument is largely supported by John Baylis in "The Future of Nuclear Weapons: Balancing Power and Morality," *International Relations*, Vol. XIII, No. 5, 1997, pp.1-14..

62) Dennis Gormley, "Antinuclear Debate Must Weigh Conventional Options," *Defence News*, August 10-16, 1998, p. 15.

63) See for example Daisaku Ikeda, "Towards a Culture of Peace," *Soka Gakkai International*, Tokyo, Japan, 1999.

The Future Challenges of Nuclear Non-Proliferation: a German Perspective

Karl-Heinz Kamp

INTRODUCTION

If we take a look at how nuclear proliferation and nuclear questions are tackled by the German public or in decision making circles, a strange contradiction is discovered. With regard to public and political attention, we have the bizarre disparity between complete non-attention most of the time and occasional eruptions of nuclear hysteria. Usually, proliferation is a non-issue in Germany and in most of the European North Atlantic Treaty Organisation (NATO) countries. Nuclear questions are debated only by a small group of nuclear dinosaurs in military or academic circles – something like inhabitants of a nuclear Jurassic Park.

If, however, some ounces of plutonium are found in German airports, or if France, Pakistan or India resume nuclear testing, then nuclear weapons suddenly make their way back into the headlines of the German press. Public attention peaks to some hysterical reactions and one witnesses a surprising, practically overnight, increase in the number of nuclear "experts" for nuclear test simulations, computerised fusion models and nuclear physics, until the topic is once again dumped into oblivion.

There are, of course, a number of experts on proliferation in the German Foreign Ministry and in the Ministry of Defence – however, I could mention only a handful of German parliamentarians – among the 669 members of the *Bundestag* who seriously care about the question of nuclear non-proliferation. Even related issues such as ballistic missile defence, which presently rates quite high on the transatlantic security agenda, are confined to a small group of experts in the decision-making circles. This situation has not changed significantly with the new government, notwithstanding the fact that one coalition partner – the Greens – has its political roots at least partly in the protest movement against American nuclear weapons in the 1970s and 1980s.

It is therefore difficult for me to present the German position on nuclear non-proliferation, since there is no such thing – at least not in the form of a broad political consensus supported by the public. I would therefore like to share some thoughts on what ought to be the German position on the proliferation problem. Two main issues will be discussed here:

- Why should Germans care at all about nuclear proliferation? What are the dangers we face?
- What should be done about it? What steps could Germany take to help take on these challenges? This second aspect will be divided into some sub-questions.

1. WHY CARE?

So then, why should Germany care at all about the issue of nuclear non-proliferation? What are the threats in that field and what are the implications?

Let me begin with a general observation. The fact that Germany and other European countries have become complacent about the threat of nuclear proliferation led political and military circles – from the early 1990s on – to the illusion of denuclearisation. There seemed to be widespread consensus that the value of nuclear weapons as a "currency" for political weight and influence had decreased significant-

ly. Hence, they ought to be disarmed completely. Examples of the denuclearisation trend include the 1996 decision of the International Court to put the legitimacy of nuclear weapons into question. Only a couple of weeks later, the Canberra Commission – a high ranking expert group appointed by the Australian government – argued in favour of the global abolition of nuclear weapons. Even high ranking American generals such as General Lee Butler or the retired NATO-SACEUR Andrew Goodpaster expressed support for the idea of total nuclear disarmament.

Parallel to these tendencies, however, an opposite trend of renuclearisation broke path in recent years. Two particular developments point clearly in that direction: first, there are clear signs that the Russian military elite intends to base the future military strategy much more on nuclear forces as a compensation for diminishing conventional capabilities. According to this view, shrinking military budgets, increasing military disintegration and the loss of conventional fighting power can only be outweighed by a stronger reliance on Russia's nuclear posture.

And there is a second trend which is even more important but hardly taken notice of. We have to face the fact that all efforts at non-proliferation, as strict as they may be, will only slow down and not entirely stop the spread of nuclear weapons. There is a danger that new nuclear players will emerge because the demand for the nuclear bomb as the perceived ultimate weapon will remain in many regions. In addition, more and more states will achieve the ability to develop these weapons on their own – with or without foreign technology support. Nuclear weapons are frequently seen as the "great power equaliser". Some smaller countries regard nuclear weapons as the only means to cope with the unmatchable conventional power of Western industrial countries, and in particular of the United States (US). And there is no doubt that nuclear weapons increase significantly the political options of a possessor state, in turn reducing the options against a nuclear power. It is hardly possible to significantly punish a nuclear armed country.

The problem is further aggravated by the fact that the disintegration of the nuclear sector in Russia and illicit nuclear trade might wash nuclear technology and expertise into the trouble spots of the world. This issue, frequently described as the "lose nukes problem", is certainly one of the major challenges in the field of nuclear proliferation. In consequence, for all the reasons just outlined, the number of nuclear players in the world is going to increase – hopefully slowly, but certainly steadily.

In that context, nuclear testing conducted by India and Pakistan in 1998 had two crucial consequences. On the one hand, it refuted simplistic models of a nuclear free world put forward by nuclear "abolitionists" who have intellectually linked total nuclear disarmament to the end of Cold War hostilities. Instead, India defined its nuclear capability not in terms of threats and responses, but as a key element for its claim on world power status. On the other hand, the tests put the problem of nuclear weapons back on the political agenda.

The imminent danger posed by the possibility of new nuclear nations, by vastly oversized nuclear arsenals as a legacy of the Cold War or by the potential spread of weapon technology from the crumbling nuclear sector in Russia, should certainly find more interest in Germany compared to previous times.

The reasons why Germany and other European allies ought to be concerned are obvious. At least three major dangers could emerge from uncontrolled nuclear proliferation – and I am not talking about the residual threat of a Russian nuclear strike, because this is the most unlikely contingency:

- More probable is the danger of NATO forces coming under a nuclear threat in crisis management operations beyond self-defence. Imagine what could have happened if the Serbian forces in Kosovo had of had access to nuclear weapons?
- There is the danger of a nuclear threat against countries allied with the US or with NATO – comparable to the chemical threat against Israel in the Gulf War.
- What about the danger of third countries using weapons of mass destruction against each other? What if Iran employs a nuclear weapon against Iraq – a remote scenario perhaps? This would hardly violate Germany's vital interest since no ally would be involved. But Iran would have broken the nuclear taboo which has existed now for more than five decades. How would one then re-establish the principle of non-use of nuclear weapons?

2. SLOWING DOWN THE SPREAD

This leads to my second major question: what ought to be done to slow down the spread of nuclear weapons? I would suggest four points that should be taken into account:

- The preservation of "classical" non-proliferation based on the existing regimes of bans, export controls and inspections supervised by the International Atomic Energy Agency (IAEA).
- Prevention of the actual use of nuclear weapons – be it an accidental launch or purposeful employment of a nuclear explosive against a perceived adversary.
- Nuclear disarmament, i.e. the controlled reduction of nuclear arsenals to an absolute minimum of nuclear weapons.
- Maintaining the safety and security of existing nuclear stockpiles and particularly the lose nukes problem in the former Soviet Union.

I will briefly discuss each of these topics, beginning with classical non-proliferation and Germany's position in that regard.

For some observers, India's and Pakistan's nuclear tests marked the end of traditional non-proliferation policy along the lines of the Non-Proliferation Treaty (NPT), simply because the existing legal framework had evidently failed to limit the number of nuclear states to five or six countries. The US Senate's decision of October last year not to ratify the test ban treaty was seen as another nail in the NPT's coffin. Such a harsh verdict, however, underestimates the successes of the NPT regime – not least the fact that South Africa scraped its nuclear warheads before joining the NPT. To write off classical non-proliferation also tends to forget that we do not have that many alternatives to limit the spread of nuclear weapons.

Nevertheless, the conditions for the NPT Review Conference in New York next month, are not very promising. In the consultations Germany started last autumn with allies and partners like the US, France and Japan, it became obvious that the major goal will be to prevent further erosion of the NPT process. To achieve that goal, Germany is highly interested in a common position within the European Union. This is all the more true, since the European nuclear powers, France and the United Kingdom, have steered a reasonable, careful and transparent course with regard to their nuclear weapons. A European position should regard the decisions taken at the 1995 NPT Conference, which aimed at a further evolution of the non-proliferation regime, as not negotiable. Instead, Germany will opt for the realisation of the Comprehensive Test Ban Treaty (CTBT), for taking up negotiations on fissile material cut-off, for transparency and confidence building with regard to nuclear weapons and for putting excess fissile material under IAEA safeguards. In that context, we should not underestimate the role of non-governmental organisations in organising informal dialogues with countries such as Pakistan or India to increase mutual transparency.

That leads to my second point: we should focus not only on nuclear non-proliferation – we should also be concerned about the danger of any actual use of nuclear weapons. Given that the world's existing nuclear arsenals, as well as the number of nuclear players, is going to increase, the challenge is not only to limit the further spread of nuclear weapons but also to prevent the employment of an atomic explosive – be it inadvertently or intentionally as an aggressive act.

With regard to the danger of an accidental launch of nuclear weapons, there is not much that Germany can do as a non-nuclear country. Since Germany is a key member in a nuclear alliance which is NATO, and as a close ally to the US, it could, however, at least bring some political leverage into play. With regard to the nuclear powers, Germany should argue in favour of nuclear de-alerting, i.e. taking as many nuclear weapons off the launch-ready mode as strategically possible. Another aspect of lengthening the nuclear fuse is a more technical one and concerns the protection of nuclear warheads once they are deployed in military sites. In NATO, all nuclear weapons are protected by so-called Permissive Action Links (PALs), which are a type of electronic lock. Particularly with regard to India and Pakistan, none of these countries has such sophisticated means at its disposal to protect nuclear weapons effectively from unauthorised or unintended use. It would be a reassuring measure if particularly the US could share some of its technical hardware and expertise with India and Pakistan to help secure the existing weaponry. Critics might argue that this would reward instead of penalise these countries for their "going

nuclear". However, even harsh sanctions are unlikely to restore the *status-quo ante* by forcing either India or Pakistan to renounce their newly gained nuclear status. It is therefore inevitable to accept the reality and to examine ways to improve the existing situation.

But what about the intentional use of nuclear weapons in a future "multinuclear world"? Among the "soon to be" members of the nuclear club there might be a number of fundamentalist, radical, aggressive and unreliable states (I avoid the term "rogue state"). These rascal states of religious or ideological zealots might be in strong opposition to Western values or to the industrial world in general. What is more, those players in world politics might not have learned the lessons of Cold War deterrence, which have led to five decades of non-use of nuclear weapons. In a crisis, they might deploy nuclear weapons against a regional adversary or – even worse – against Western industrialised countries that they are ideologically opposed to.

Any use of a nuclear explosive – even if it is in a regional context in, for example, Northern Africa or Asia – might transform the international system more profoundly than the collapse of the Soviet Union. There therefore remains the necessity for two elements that are often neglected in the non-proliferation context: deterrence and defence. Both options are certainly no "silver bullets" to cope with all nuclear risks and challenges, but they are certainly options one might want to have at one's disposal in a concrete crisis.

Deterrence is one of the classical choices to keep other countries from threatening or even using nuclear weapons or other means of mass destruction against other countries. This includes not only deterrence by conventional military power, but nuclear deterrence as well. With the end of the superpower confrontation, however, the role of nuclear deterrence has changed and is increasingly seen in the context of biological or chemical weapons threats. The successful prevention of Saddam Hussein using chemical weapons against Israel supports the expectation that nuclear deterrence can work, also beyond the East–West framework.

Defence, which includes for instance measures of force protection or missile defence, is also one element in the entire spectrum of measures to cope with nuclear challenges. However, defence is also far from being a cure-all for weapons of mass destruction threats, since it is not at all sure whether measures such as missile defence will prove to be effective against "asymmetrical threats" (weapons delivery by civil aircraft, World Trade Centre scenarios).

3. NUCLEAR ARMS CONTROL

The third area we should be concerned about in the context of nuclear non-proliferation is the issue of nuclear arms control. Like the previous question of how to avoid a nuclear use, nuclear arms control is another issue in which Germany as a nuclear "have not" has a vivid interest but only a limited say.

There is no doubt that the arsenals of the two nuclear superpowers – Russia and the US – are vastly oversized. Nuclear disarmament is therefore of crucial importance. The nuclear arms control process as represented in the Strategic Arms Reduction Treaty (START) II process is, however, stalled and its future is uncertain. The Russian Duma has not yet ratified the treaty and is not going to do so in the near future. The present policy of the US Senate is also not helpful in terms of reviving nuclear arms control. This is all the more regrettable since particularly Russia will hardly be able to finance more than 500–1000 operable nuclear launchers and a slightly higher number of warheads in the medium-term.

One option to overcome many of these difficulties would be the concept of unilateral cuts, which would impose political leverage on the other side to follow that path. Unilateral reductions announced by the US would enable the Russian side to proclaim similar "initiatives" to realise their inevitable nuclear cuts in a face-saving manner.

4. NUCLEAR LEAKAGE

The final area of concern in the field of nuclear non-proliferation is the danger of nuclear leakages from the former Soviet Union – the so-called lose nukes issue. The key question is how to dismantle the nuclear legacy of the Cold War in a safe and reliable manner. Particularly the insecurity of fissile material in Russia represents a serious challenge to the international non-proliferation regime. Large-scale leakage of weapons, materials or expertise from the former Soviet Union would seriously damage, or perhaps even destroy, the non-proliferation

regime by making weapons capabilities available to potential proliferators, both state and non-state actors. Stabilising the Russian nuclear sector is one of the key challenges for the period immediately ahead. Since 1992 there has been an international effort led by the US's so-called Nunn-Lugar Programme to help Russia and other successor states of the Soviet Union, dismantle their excess nuclear weaponry and delivery systems, to safely store nuclear weapons components, to create safeguards against proliferation and the spread of nuclear expertise, and to assist in defence conversion efforts. The lions share of the money for these activities came from the US.

Given the geographical proximity of Germany to Russia, we should certainly do more to take on a challenge that might affect our vital security interests. But this is not only an obligation for Germany. Contributing to the enhancement of nuclear security in the former Soviet Union should be an urgent priority of all states that possess the financial or technical ability to help. International engagement must be increased if this problem is to be addressed successfully.

CONCLUSION

These four aspects outline the views that Germany should have on the risks and dangers of nuclear non-proliferation. But as I said at the outset, it is not so much a problem to find agreement among experts on these kinds of questions. What Germany is really lacking is a sufficient level of political and public awareness regarding these dangers. Such awareness is an inevitable precondition for taking the necessary steps to cope with these challenges.

Alas, Germany – like many other European countries – is plagued by political and public indifference with regard to proliferation. The result is an inconsistent policy. For instance, almost a year ago Germany signed an agreement at the NATO summit in Washington to significantly improve NATO's military and technical capabilities for taking on the dangers posed by nuclear proliferation. Such an obligation has unquestionably major financial implications – it will cost money. At the same time, Germany has significantly reduced its defence budget in an unprecedented manner. By 2002, Germany will rank 18th out of the 19 NATO countries, in terms of the percentage of its gross national production spent on defence.

This is certainly not a promising sign for Germany's preparedness to deal with nuclear non-proliferation. Neglecting these dangers will not only undermine Germany's security, but will also weaken Germany's position both within NATO and on the international arena.

Nuclear Non-Proliferation and the NPT Review Conference: the Pakistani Perspective

Ghulam R. Malik

INTRODUCTION

Pakistan's policy regarding the issue of non-proliferation has remained clear and consistent from the beginning. Pakistan has always supported the international community's efforts towards the attainment of non-proliferation objectives. In fact, between 1984 and 1986 Pakistan supported all 10 resolutions concerning the Comprehensive Test Ban Treaty (CTBT) at the United Nations (UN) General Assembly.

Every government in Pakistan has supported the CTBT in principle. As far back as 1963, Pakistan signed the Partial Test Ban Treaty (PTBT) and ratified it in 1988. During negotiations for the Nuclear Non-Proliferation Treaty (NPT), Pakistan proposed a test ban and fissile materials production cut-off to create a more balanced set of responsibilities between the nuclear weapon states (NWS) and the non-NWS. In 1987, Pakistan as part of its efforts to find a solution to the problem of nuclear proliferation in South Asia – proposed a regional test ban. During the 1991 PTBT amendment conference, Pakistan joined other non-aligned countries in rejecting the argument that nuclear testing was necessary for deterrence. Pakistan has always been supportive of a comprehensive test ban, and even agreed in 1979 to accede to the NPT simultaneously with India.

1. REGIONAL ASPECTS ESSENTIAL

Pakistan has always believed that a regional approach to non-proliferation and disarmament is complementary to international endeavours towards these objectives. We believe that without taking into consideration the regional aspects of non-proliferation it would not be possible for such states as Pakistan, which face strategic security threats, to adhere to provisions such as the NPT. Since the first Indian nuclear test in 1974, Pakistan made several proposals to keep the region free of nuclear weapons. These proposals included:

- Establishment of a nuclear weapons free zone in South Asia – 1974.
- Joint declaration renouncing the acquisition or manufacture of nuclear weapons – 1979.
- Mutual inspection of nuclear facilities – 1979.
- Simultaneous adherence to the NPT by India and Pakistan – 1979.
- Simultaneous acceptance of International Atomic Energy Agency safeguards on all nuclear facilities – 1979.
- Bilateral/regional nuclear test ban – 1987.
- Conference on nuclear non-proliferation in South Asia – 1991.
- Zero missile zone in South Asia – 1973.
- No war pact – 1997.

All these proposals were, however, rejected by India and were largely ignored by the international community.

Pakistan's consistent efforts to have a foolproof nuclear non-proliferation regime realised in South Asia have never been met with a favourable response from India. The international community has also failed to redress Pakistan's legitimate concern in this regard. They have been unable to appreciate that in the presence of an outstanding problem such as Kashmir, in accordance with the UN Security Council's resolutions, coupled with serious security threats from our neighbour, we would

not be in a position unilaterally to support a nuclear non-proliferation regime.

2. MAINTAINING STRATEGIC BALANCE

Pakistan never wanted to go nuclear. However, nuclear testing conducted by India in May 1998, accompanied by serious open threats to Pakistan, did not leave any option for us to restore the strategic balance in the region, warding off our neighbour's hegemonic designs. There was a distinct possibility that India could have miscalculated Pakistan's capabilities and thus carried out a military adventure against it.

Pakistan's response to the Indian nuclear test was therefore indispensable for preserving the fragile peace in South Asia, as well as safeguarding Pakistan's independence and territorial integrity. This was not a decision based on choice, but in fact something that was imposed on us. Bearing in mind our legitimate security concerns, Pakistan's nuclear capability is now an integral part of its defence and deterrence doctrine.

In the aftermath of the May 1998 nuclear tests by India and Pakistan, the NPT has become irrelevant, as it recognises only those states as nuclear powers that have manufactured and exploded a nuclear weapon or other nuclear explosive prior to 1 January 1967. In order for Pakistan to join the NPT it will therefore have to roll back its nuclear programme which is not a practical proposition. Pakistan's nuclear capabilities now constitute an integral part of its defence doctrine. Given India's preponderance in conventional forces and its hegemonic policies, Pakistan cannot afford to give up its nuclear deterrent. Pakistan's reliance on nuclear capability for its independence and territorial integrity is therefore absolute. Pakistan should not be expected to come on board the NPT as a non-NWS.

Pakistan does not require additional nuclear explosive tests. Accordingly, we are observing a unilateral moratorium on further testing. The government of Pakistan has already initiated a public debate on the question of the CTBT with a view to evolving a national consensus on our signature. A decision in this regard will be taken in conformity with the people's aspirations and in the larger interests of Pakistan.

Pakistan is looking forward to the commencement of negotiations in the conference on disarmament at Geneva for a non-discriminatory, multilateral, international and effectively verifiable treaty banning the production of fissile materials for nuclear weapons or other nuclear devices. It cannot, however, accept a unilateral or multilateral moratorium on the production of fissile materials pending the conclusion of a treaty in Geneva.

3. PROPOSALS FOR STRATEGIC AND CONVENTIONAL RESTRAINT REGIMES

Arms races are intrinsically spiralling and can have disastrous consequences. Pakistan therefore does not want to enter into an arms race with India. It is in this spirit that Pakistan in October 1998 put forth several proposals geared at establishing strategic and conventional restraint regimes in South Asia. These proposals envisage steps for preventing a nuclear and ballistic missiles race, the establishment of a risk reduction mechanism, the avoidance of nuclear conflict, formalising a moratorium on nuclear testing, non-induction of anti-ballistic and submarine launched ballistic missiles, adherence to the doctrine of minimum nuclear deterrence and the mutual and balanced reduction of conventional forces and armaments.

CONCLUSION

Pakistan is unilaterally and irrevocably committed not to transfer sensitive technology, material and equipment to any third country. Adequate laws and procedures already exist in the country to prevent any unauthorised tangible and intangible transfer. But Pakistan is not complacent. We have been engaged in detailed discussions with the United States, the European Union, Japan, etc. to further strengthen our export control procedures and to plug any loopholes. The government has already announced the establishment of a high level authority to deal with these sensitive matters.

Nuclear Non-Proliferation and the NPT Review Conference: the Russian Perspective

Vadim B. Lukov

INTRODUCTION

The federal government of Russia regards nuclear proliferation, and indeed the proliferation of any weapon of mass destruction, as a major threat to both national and international security. This was clearly stated in the national security concept decreed by President Putin in January this year.

In this context I would like to stress that the Russian government appreciates any step that contributes to strengthening the non-proliferation regime, especially such courageous and responsible acts as renouncing the possession of nuclear weapons. And I would like to commend the government of South Africa for taking this step several years ago. South Africa indeed blazed this trail, which has been followed by a number of other countries. Ukraine, Belarus and Kazakhstan also renounced possession of nuclear weapons after the dissolution of the Soviet Union.

1. NUCLEAR PROLIFERATION AND NATIONAL SECURITY

The Russian government regards nuclear proliferation as a key threat to national security. A reason for this is because Russia is quite close to an arch of nuclear threshold countries and conflict-prone regions. Russia indeed is closer than any other nuclear power to regions of potential nuclear confrontation. This alone pushes the Russian government to be very active in promoting nuclear non-proliferation.

Another reason is that the Russian government, and indeed the nation, is confronted with the increased threat of international terrorism. The abject ruthlessness with which Chechen terrorists killed in mass terrorist blasts 1500 people in Moscow and elsewhere last year, and the ruthlessness with which elementary chemical weapons were used in Grosny against federal troops and the civilian population of the town, show that we are confronted with a resolute and staunch opposition to human lives at a massive scale.

And it is very fortunate that the Federal Security Service prevented any leakage of nuclear fissile materials from the Russian army's military depots into the hands of these terrorists.

2. THE NPT AND ITS FUTURE

The Russian Federation believes that the Nuclear Non-Proliferation Treaty (NPT) could be strengthened along the following five lines:

- Continuing nuclear disarmament with the preservation of the current strategic stability regime.
- Introducing the Comprehensive Test Ban Treaty (CTBT) worldwide and ensuring its practical application.
- Enhancing the export control of nuclear fissile materials and related nuclear technologies.
- Universalising the NPT, ie. spreading its influence to regions where traditional animosities and hostilities unfortunately thrive, such as South Asia and the Middle East.
- Settling regional conflicts, especially in the areas mentioned previously.

Attacking the NPT problem along these lines is, however, becoming increasingly difficult.

We are confronted with a set of dangers and factors of unpredictability that will surely make

the forthcoming NPT Review Conference a difficult endeavour.

3. DANGERS AND FACTORS OF UNPREDICTABILITY

The first danger I see is the concentrated attempt by a number of Western governments, including the most powerful nuclear states, to create first class security for themselves at the expense of the security of other members of the NPT regime. This effort is translated into practical, and indeed dangerous, actions.

The federal government of Russia is concerned that the United States (US) government is embarking upon the path of deploying a nationwide anti-ballistic missile (ABM) defence system. This policy unfortunately runs counter to the basics of nuclear deterrence and the nuclear stability regime that was embodied from the outset, in the intricate and expensive system of strategic arms control agreements. I remember the difficult conversation that the then US Secretary of Defence Robert McNamara had with the then Soviet Prime Minister, Mr Kossygin, in Glassborough in 1967. According to Mr McNamara, it took him one-and-a-half hours to convince the Soviet leader of the day, that dismantling the ABM systems, which both sides had started to develop, would be beneficial to Russia's security.

The ABM Treaty must be preserved. Its dissolution will be fraught with long-term, unpredictable consequences for both nuclear security and nuclear non-proliferation. The argument that this nationwide ballistic missile defence is aimed at rogue states and terrorist nuclear shots at US territory, frankly does not hold water.

An analysis of future deployments which was done by the Russian General Staff, shows that the system to be deployed will be targeting Russian and, to a lesser degree, Chinese nuclear missiles fired in an eastward direction from Russia and perhaps from China. This move will undermine the nuclear deterrence regime and nuclear stability as such.

The Russian federal government is also profoundly concerned with the non-ratification of the CTBT by the US Senate. We agree with the arguments lodged by the US government that the democratic process in that country prevented the best attempts deployed by the Clinton Administration at enforcing the Treaty. Russia now has its own democratic institution, the State Duma, which is furious at the actions of its American counterpart. The federal government will conduct a sustained and determined effort to press for ratification of this treaty by the Duma, although US legislators have made our task difficult indeed.

The second set of threats and factors affecting predictability is the recent illegitimate use of force by the North Atlantic Treaty Organisation (NATO) against Yugoslavia and Iraq. On the surface, this trend towards employing massive military might without United Nations Security Council sanction has no relation to the NPT. I must stress, however, that this trend is a major inducement to third world countries to acquire nuclear deterrents, thereby protecting themselves from suffering the same fate as Yugoslavia, Sudan, Iraq and others.

Legitimacy in international relations goes hand in hand with strengthening the NPT regime.

This third factor that worries Russia is the introduction of double standards in the export control regime policies. Russia participates in all nuclear-related nuclear arms control regimes, except the Australian group, i.e. the Group of Nuclear Suppliers.

I regret to note that some of our Western partners attempt to impose on Russia, export control sanctions which they would not dare to impose on their own companies.

Ten Russian research institutes and commercial companies are included in a list recently released by the US State Department. These organisations are accused of being lax with regard to nuclear technologies or fissile materials. On the other hand, however, hundreds of violations which have been well-documented by both American and West European companies, dealing with the transfer of components of nuclear technologies and research results to Iraq and some South Asian countries, go unpunished. This double standard is most disturbing.

CONCLUSION

I believe that debate at the upcoming NPT Review Conference will be multi-layered, dealing with concerns of a global order. Many of the concerns mentioned in this paper will be raised by the Russian side and other like-minded nations. I believe, however, that the conference will revolve mainly around a key philosophical issue. Are our nuclear capable Western

partners prepared to renounce their claims to first class nuclear security, which they want to achieve at the expense of the rest of the world? Are they prepared to embrace the doctrine of legitimate use of force? Are our Western partners prepared to embrace the position of a fair and objective export control regime, without pretensions of being an arbiter beyond reproach? The NPT Review Conference needs a democratic, fair and frank discussion.

Nuclear Non-Proliferation and the NPT Review Conference: the United States Perspective

John McNamara

INTRODUCTION

Next month marks the last major worldwide gathering of nuclear non-proliferation experts of the old millennium. Representatives from virtually every country will meet in New York to review the Nuclear Non-Proliferation Treaty (NPT) – a 30-year-old international agreement with 187 parties. The NPT is nearly universal, with only Cuba, India, Israel and Pakistan outside the treaty. The United States (US) will be actively engaged in this review and looks forward to a full debate, including highlighting the many impressive achievements of this vital treaty.

The NPT is one of the great success stories of nuclear arms control. It has made major contributions to global security and economic well being over the past three decades.

The NPT:

- is an indispensable tool in preventing the spread of nuclear weapons
- provides an essential foundation for the reduction of existing nuclear arsenals and for continued progress towards nuclear disarmament
- promotes the peaceful uses of the atom for the generation of electricity and for its many applications in medicine, industry, agriculture and other areas.

1. DIRECT SECURITY BENEFITS

There is strong international consensus that the further spread of nuclear weapons would endanger the security of all countries, and threaten global and regional stability. The NPT and near universal support for nuclear non-proliferation are the primary reasons why nuclear weapons have not spread as fast as many had predicted in the 1960s.

The security benefits of the NPT are evident in every region of the world. South Africa's decision to abandon its nuclear weapons programme and accede to the NPT in 1991, enhanced the security of all African states and led to the negotiation of a treaty to make Africa a continent free from nuclear weapons. The NPT provided stability in the midst of the great political and economic changes that occurred in Europe and central Asia over the past decade. All the newly independent states of the former Soviet Union returned nuclear weapons deployed on their territories to Russia, and joined the NPT as non-nuclear weapon states.

There have been challenges to the NPT. The international community has responded strongly to violations of the NPT by Iraq and North Korea. The NPT is a critical tool in continued efforts to restrain the nuclear programmes of both countries.

Nuclear proliferation in South Asia poses a continuing challenge. But the reaction to nuclear tests by India and Pakistan also reinforced the NPT, as nations around the world condemned these actions and reaffirmed the critical importance of the treaty.

The International Atomic Energy Agency (IAEA) is the primary mechanism for verifying that NPT parties are living up to their obligations. IAEA safeguards under the treaty, including international inspections, help to deter the use of nuclear material for nuclear weapons. The model safeguards protocol approved in 1997 gives the IAEA an even stronger tool for this purpose.

2. NUCLEAR ARMS CONTROL AND REDUCTIONS

The NPT limits nuclear weapon states to those existing in 1968: namely, the US, Russia, the United Kingdom, France, and China. Article VI of the NPT calls on all parties to take effective measures relating to nuclear disarmament and to work towards the objective of general and complete disarmament. The NPT's role in checking nuclear proliferation is critical in creating a climate in which major reductions in nuclear arsenals can be pursued. A vast array of actions have been taken that meet the objectives of Article VI.

The US–Russian nuclear arms race is over. Both countries are seeking further reductions in nuclear weapons and their delivery systems, and are taking other steps to reduce their nuclear weapon infrastructures.

Since the fall of the Berlin wall, the US has dismantled approximately 13 000 nuclear warheads and bombs. It has reduced its stockpile of strategic nuclear weapons by nearly half and other types of nuclear weapons by 80%. It has taken its heavy bombers off alert and its strategic forces are not targeted on any country. NATO has reduced the number of nuclear weapons for its sub-strategic forces in Europe by over 85% and the reaction time of the remaining dual-capable aircraft is now measured in weeks rather than minutes. NATO nuclear forces are not targeted on any country.

The dismantlement of strategic ballistic missile launchers and heavy bombers under the Strategic Arms Reduction Treaty (START) I agreement is ahead of schedule. There is increasing hope that the Russian Duma will soon ratify START II. Meanwhile, discussions on START III are under way. When successful, the cumulative effect of the three START agreements would be an 80% reduction in the number of deployed strategic nuclear warheads since the end of the Cold War.

The US has spent $3.2 billion to help Russia and others to eliminate over 500 missiles and bombers, to ensure that nuclear materials are safe and secure, and to promote other arms control and non-proliferation objectives. The US is also working with Russia to place excess fissile material under international monitoring and to irreversibly transform excess fissile material into forms unusable for nuclear weapons. The US has removed 226 tons of fissile material from its military stockpile, and in 1992 announced a halt in the production of fissile material for nuclear weapons.

The US took the lead in negotiating the Comprehensive Test Ban Treaty (CTBT) and President Clinton was the first to sign the treaty in 1996. The US has not conducted nuclear test explosions since 1992. President Clinton has made it clear that the US will continue this moratorium and will encourage others to do likewise.

President Clinton has called for a constructive bipartisan dialogue with the US Congress this year, to lay the groundwork for eventual US ratification of the CTBT. We have formed a senior-level governmental task force and enlisted former Chairman of the Joint Chiefs of Staff General John Shalikashvili to help build bipartisan support for ratification.

Some have criticised US policy on national missile defence (NMD) as undermining arms control. It does not.

The Anti-Ballistic Missile (ABM) Treaty could be amended to allow for a limited NMD capability while preserving strategic stability and permitting continued reductions in nuclear forces. The treaty has been amended before. President Clinton is expected to make a decision this summer, at the earliest, on whether to deploy a limited NMD system. He will take into account the threat, technical feasibility, affordability, as well as national security factors including arms control and the views of US allies.

3. PEACEFUL NUCLEAR COOPERATION

The NPT creates a vital framework for peaceful nuclear cooperation among nations by providing assurances that non-nuclear weapon state parties will not use their nuclear programmes to acquire nuclear weapons. The US engages in substantial peaceful nuclear cooperation with NPT parties.

US assistance through the IAEA benefits many developing countries. Among these projects are nuclear applications in the fields of water resources, nutrition, agriculture and human health. Under bilateral agreements, the US exports millions of dollars of fuel and nuclear equipment to many countries with reactors that produce electricity.

It is important that the 2000 NPT Review Conference in New York reaffirms the treaty as an essential part of the international security system. Preparations have been under way for

several years, and we expect vigorous debate and differences of view on key issues, including approaches to nuclear disarmament. We are working with many other NPT parties to ensure we have a constructive and balanced conference, marked by a healthy dose of realism about what the NPT review process can achieve. By rededicating ourselves to the NPT, we can ensure that this treaty will continue to play a vital role in the next millennium.

Nuclear Non-Proliferation and the NPT Review Conference: the Indian Perspective

Radhika L. Lokesh

INTRODUCTION

As you are no doubt aware, India is not a signatory to the Nuclear Non-Proliferation Treaty (NPT) and therefore has not participated in the past five review conferences. The invitation to this workshop, I may safely presume, is therefore in recognition of the fact that India has been at the forefront of efforts to promote and strengthen international cooperation in the area of non-discriminatory and universal disarmament.

There has been some confusion in the minds of many why India, as a fervent champion of disarmament, should have opposed the NPT and voted against the Comprehensive Test Ban Treaty (CTBT).

Permit me to clarify these aspects of India's position on non-proliferation, disarmament and issues related to international security.

1. SUPPORTING UNIVERSAL NUCLEAR DISARMAMENT

The nuclear tests conducted by India in May 1998 also need to be viewed in the context of India's strong commitment in this area and were in fact not inconsistent with India's traditional emphasis on non-discriminatory and universal nuclear disarmament. India's policy sets it apart from other nuclear weapon states (NWS) that reject global disarmament proposals because they refuse to visualise their security without nuclear weapons. Also, as a NWS, India is conscious of its additional responsibility and would endeavour, even more than in the past, to take initiatives in pursuit of global nuclear disarmament.

In 1947 when India emerged as a free country, the nuclear age had already dawned. Its leadership at the time took the crucial decision to opt for self-reliance and independence of action, rejecting Cold War paradigms and choosing the path of non-alignment. They realised that a nuclear weapons free world would enhance not only India's security but that of the world. During the 1950s India took the lead in calling for negotiations for a total prohibition and elimination of nuclear weapons but these calls were not heeded. Meanwhile, in 1964, China joined the exclusive nuclear club – a geo-strategic situation which India could not ignore.

In 1965 India, along with a group of non-aligned countries, put forward the idea of an international non-proliferation agreement under which the NWS could agree to give up their nuclear arsenals in return for a commitment from other countries to refrain from developing or acquiring such weapons. This balance of rights and obligations was not acceptable to the then nuclear powers. India sought security guarantees in the form of a nuclear umbrella, but none of the nuclear powers was willing to extend to us the expected assurances. India therefore was left with little choice but to fashion its own security responses to the nuclear environment around it.

2. UNIVERSAL, COMPREHENSIVE AND NON-DISCRIMINATORY

Despite the fact that India had initiated the idea of an international non-proliferation agreement, we could not be party to the NPT as it emerged in 1967 for the following reasons:

- The Treaty legitimises nuclear weapons in

the hands of a few countries and does not serve the overall objective of the complete elimination of nuclear weapons within a time-bound framework.
- The Treaty does not ensure the non-proliferation of nuclear weapons but only prevents the dissemination of weapons to non-NWS. It thus allows vertical proliferation by not imposing any curbs on the continued manufacture, stockpiling and refinement of nuclear weapons by existing NWS.
- The Treaty is unequal in that while the undertakings assumed by non-NWS are obligatory, for the NWS these are on a "best-endeavour" basis.
- The Treaty is discriminatory in regard to the application of safeguards and controls upon the non-NWS.

India is therefore not opposed to the concept of non-proliferation, but would like non-proliferation restraints to be universally applied without any discrimination. Our Prime Minister has often affirmed that India shares the concerns expressed by other world leaders on the threat that nuclear weapons pose to international peace and security; but he also stressed that measures which were merely preventive, punitive or partial in nature could not achieve the desired results.

The government of India has consistently called for a universal non-proliferation regime based on a global approach. Speaking at the United Nations (UN) Security Council Summit meeting in New York on 31 January 1992, the Prime Minister said: "to be effective, this global non-proliferation regime must be universal, comprehensive and non-discriminatory and linked to the goal of complete disarmament".

The objections that we had to the NPT continue to remain valid even today. In fact, the indefinite extension of the NPT in 1995 merely served to reinforce for all time the discrimination between NWS and non-NWS, violating all norms of equity and justice. Article 9 of the NPT recognises a NWS as one which undertook nuclear tests prior to 1 January 1967. After our nuclear tests there has been a debate whether India would be recognised as a NWS or not. The reality is that the status of an NWS is neither a conferment that we seek nor is it for others to grant. By failing to amend this definition of NWS, and merely calling on India to accede to the NPT, the five NWS are failing to take cognisance of the ground realities in South Asia.

Even though India has not signed the NPT, our country's national position has always been consistent with obligations imposed by the Treaty. Under the Treaty a NWS assumes three obligations:
- *Article 1:* not to transfer nuclear weapons or other nuclear explosive devices or control over them.
- *Article 3:* not to provide source, material or equipment for the production of such material except under safeguards.
- *Article 6:* to engage in negotiations in good faith, leading to gradual reduction and eventual disarmament.

On all these counts India's record has been impeccable; better than some countries party to the NPT. India has maintained effective export controls on nuclear materials as well as related technologies even though it is neither party to the NPT nor the Nuclear Suppliers' Group. India has been conveying to our interlocutors that we are willing to participate in control regimes but on the basis of equality. This policy of restraint and responsibility is neither adequately recognised nor appreciated.

3. HOW EFFECTIVE HAS THE NPT BEEN?

Apart from the principle of discrimination on which India opposed the NPT, after 30 years the question to ask is: how effective has the NPT been?

In the post–Cold War world there has been a massive proliferation of nuclear weapons with grossly inadequate safeguards. This proliferation covers both nuclear weapons and delivery systems, and is substantially based on the clandestine transfer of technology resources and materials from NWS to non-NWS.

The flawed treaty served to aggravate India's security concerns as from India's perspective, non-proliferation efforts became increasingly selective and malleable. We were faced with a nuclear environment without parallel in the world, given that we had on our borders a declared nuclear state and a threshold nuclear weapons power with a long-standing clandestine nuclear weapons programme.

The NWS turned a blind eye to the proliferation of nuclear weapons and the development of missiles on India's borders, which was based on the exchange of substantial nuclear tech-

nologies and equipment between Pakistan and nuclear and near-nuclear powers in the region.

The security environment deteriorated in the late 1980s and 1990s. By 1987 there was confirmed information about Pakistan's nuclear capability. In the context of this greater nuclear proliferation, Prime Minister Rajiv Gandhi proposed in 1988 a time-bound framework for disarmament at the special session of the UN General Assembly but this did not fit the agenda of the NWS. During this period India engaged in a dialogue with major interlocutors, which was based on the following:

- Willingness to join any effort which would bring about non-discriminatory non-proliferation, arms control and disarmament.
- Opposition to Pakistan's diversionary calls for a nuclear weapons free zone in South Asia, which were based on artificial geographical criteria, ignoring the geo-strategic reality of the nuclear environment in the entire region.
- Willingness to participate in a broader Asian conference with a larger number of participants to discuss the possibility of a nuclear weapons free zone in the whole of the Asian landmass and adjacent seas, provided all countries in the region and the nuclear weapon countries undertook mutual and equal obligations to make Asia free from threats of nuclear weapons – such an Asian conference would be an interim step towards holding a global conference within a definite time frame.

India's nuclear policy has remained committed to one basic tenet: that the country's national security in a world of nuclear proliferation lies either in global disarmament or in the exercise of the principle of equal and legitimate security for all. This has been the basis of our consistent campaign for nuclear disarmament. Our experience, however, showed a lack of commitment to a disarmament agenda.

As recently as 1993, India was the co-sponsor of the Resolution of the UN General Assembly which asked the Conference on Disarmament to conclude quickly the CTBT. While India wished to place the CTBT in a disarmament context – as part of a step-by-step approach aimed at achieving complete elimination of nuclear weapons within a time-bound framework – the treaty which was finalised was nothing more than a moratorium on further nuclear explosions. While being indifferent to India's security concerns, the CTBT placed constraints on India's nuclear options. This was one of the primary reasons underlining India's decision in 1996 not to subscribe to the CTBT.

Though India had demonstrated its nuclear capability in 1974, successive governments had taken steps to safeguard India's independence in exercising the nuclear option. Subscribing to the CTBT in 1996 would have severely limited India's nuclear potential at an unacceptably low level, specially when the CTBT as drafted did not carry forward the nuclear disarmament process. India could not accept differential standards of national security or a regime of international nuclear apartheid.

4. INDIA'S NUCLEAR POLICY

India's nuclear tests in May 1998 were dictated by national security concerns centring around:

- the deteriorated security environment caused by nuclear weapons in our neighbourhood
- unchecked nuclear and missile proliferation in the region
- disequilibrium in the balance of power caused by the induction of these technologies in a clandestine manner (The fact that Pakistan conducted nuclear tests within 15 days of India's tests vindicated India's stand that it had been clandestinely acquiring nuclear capability, with the express complicity of the guardians of the nuclear non-proliferation regime.)
- legitimisation of nuclear weapons by the NWS
- an emerging nuclear paradigm from which India was excluded
- the more ominous recent phenomenon of externally aided terrorism, militancy and clandestine war through hired mercenaries along our borders.

Soon after the tests were conducted in May 1998, the government announced key elements of India's nuclear policy. India has declared a moratorium on further testing which meets the core obligations of the CTBT. India has declared that it will not come in the way of the entry into force of the CTBT and we are in the process of building a national consensus on this issue despite the negative implications of the United States Senate vote. Two key elements of India's doctrine, namely minimum credible deterrence and “no first use”, clearly prove that

India's tests were not directed against any country and the deterrence posture is a purely defensive one. The government has repeatedly stated that it is not seeking parity with any country but it is only trying to ensure that its deterrent, while at a minimum level, is also credible so as to be effective. This should allay all apprehensions about a nuclear arms race, accidental use or escalation of any sort.

India has a structure of bilateral confidence building measures (CBMs) in place with Pakistan. There are agreements on prohibition of attacks on nuclear installations and facilities, advance notice of military exercises, etc. A dedicated communication link exists between the director generals of Military Operations of both sides. These conventional CBMs were sought to be supplemented with a nuclear and missile related CBM in the framework of a memorandum of understanding signed during the Lahore Summit of February 1999. Unfortunately, Pakistan's armed intrusion in Kargil and the accession to power in Islamabad of the very architect of this misadventure, has set the process back.

Similarly, India and China have also signed in 1993 and 1996, agreements to bring peace and tranquillity to their common border. Recently, India and China have begun a dialogue on security issues following the June 1999 visit of India's foreign minister to Beijing. We have a number of CBMs in place and India has already indicated its readiness to enter into a bilateral restraint arrangements also in the nuclear field, taking into account the unilateral commitment of both countries to "no first use".

As mentioned earlier, India's record in maintaining safeguards, inspections, export controls, etc. has been impeccable. India has also announced its readiness to participate in negotiations on the Fissile Material Control Treaty but we need to assess the direction of the negotiations before considering multilateral initiatives in this area.

CONCLUSION

India realises the practical limitations in eliminating nuclear weapons and acknowledges the complexities of the issues involved, but the global community must commit itself and move towards this goal step by step.

A good beginning would be to formalise a global "no first use" agreement as a first step to delegitimising nuclear weapons and a non-use agreement against non-NWS. NWS also need to take steps to lower the alert status, through gradual de-alerting actions, consistent with policies of no first use and the defensive role of nuclear weapons.

These would be positive and concrete steps in the right direction. India will continue to work towards these initiatives to bring about a stable, genuine and lasting non-proliferation, thus leading to a nuclear weapons free world.

Concluding Remarks

Greg Mills

INTRODUCTION

From the 1950s through to the 1980s, much attention was focused on the threat of an apocalyptic nuclear exchange. As President John F Kennedy observed in 1961:

> "Today every inhabitant of this planet must contemplate the day when this planet may no longer be habitable. Every man, woman and child lives under a nuclear sword of Damocles, hanging by the slenderest of threads, capable of being cut at any time by accident or miscalculation or madness."

This overriding threat led to a reliance on deterrence – along with its more practical sidekick, the arms and technology race – as a means of providing a global balance of power, and the parallel need for arms control and disarmament regimes.

The Nuclear Non-Proliferation Treaty (NPT) was at the core of these regimes. It included a commitment by nuclear weapon states (NWS) not to make such weapons available to non-NWS; a pledge by non-nuclear countries signed up to the treaty not to acquire nuclear weapons and to accept international safeguards, established and monitored by the International Atomic Energy Agency (IAEA), and a concomitant undertaking to assist in the peaceful (non-weapon) use of nuclear technology; and, an obligation on the part of NWS to enter into genuine negotiations for arms control and nuclear disarmament.

The treaty, as we know, is reviewed every five years – the last such review occurring in 1995. This conference was a watershed in two ways: first, in terms of the treaty, given that it was permanently extended.

Second, closer to home, it has been interpreted as a defining moment for South African foreign policy given the creative role played by the Republic in crafting an indefinite, if conditional, extension agreement to the treaty. South Africa's hand in this was strengthened by its status as the sole, voluntarily disarmed nuclear weapons power.

We have, however, reached a point in history where the Cold War arms control and disarmament regimes, but not nuclear weapons, face redundancy. Indeed, contrary to the progress made by such regimes during the early part of the 1990s, we face a time of uncertainty. I propose three reasons why this is so.

1. WEAPONS PROLIFERATION BY STATE AND NON-STATE ACTORS

With the collapse of the Soviet Union, global concerns appeared to have progressed and developed past the point of mutually assured destruction – past the debate as to how to protect against and possibly survive[1] a nuclear war, to that of consigning such weapons to the dustbins of sovereign states, often thought of as rogue actors.

Indeed, the end of the Cold War has not removed the threat of a nuclear war, despite the removal of the "fingers on the trigger" – the detargeting of missiles which has reduced the threat of an immediate nuclear exchange. The number of warheads overall in the world may be in decline, but they are today in the hands of more and more state and non-state actors.[2] Thus the theory of nuclear weapons has had to move from deterrence based on the logic of self-interest, to protection against proliferation

involving those who may not necessarily share such rational interests. For despite the crude characterisations to the contrary by the West, the presence of rationality in the Soviet (or, for that matter, Chinese) leadership was a critical element in the credibility of nuclear deterrence.

2. ANTI-BALLISTIC MISSILE (ABM) DEFENCE PROLIFERATION

The spread of such technology has led to the development of ABM (or of Ballistic Missile Defence – BMD) technology and their possible deployment by the US and others. For example, in 1999, US Defence Secretary William Cohen declared that the US would allocate a total of US$10.5 billion for national missile defence through to 2005.[3]

The development of ABMs has resulted from the proliferation of nuclear weapons. Paradoxically, this proliferation is a result of at least two factors: one, the belief that states are politically only taken seriously (in the context of the United Nations [UN], for example) if they possess nuclear weapons and the corresponding failure of global disarmament measures such as the NPT; and second, as a result of the tremendous advantage in conventional weaponry possessed by the Western alliance. The simple lessons of the 1991 Gulf War were, in the words of the former Indian Army Chief of Defence Staff: "Don't fight the US unless you have nuclear weapons" and "the next conflict with the US would involve weapons of mass destruction".[4]

Active BMD has been likened to shooting at one bullet with another. The weapons test programme of the US THAAD missile, for example, has been characterised by some high-profile failures. But whatever the questions about the practical utility of BMD and the contributing factors to their deployment, the potential extension of the deployment of ABMs is seen to undermine the current nuclear status quo (at least through jeopardising the ABM Treaty), reinforcing the need to possess sophisticated nuclear weaponry, and leading to a further missile arms race. It would also de-emphasise the need for political solutions to the conditions that have given rise to proliferation in the first place.

3. THE FAILURE OF THE ETHOS OF MULTILATERALISM

Finally, related to the above, there has been a failure to capitalise on the end of the Cold War in pushing ahead with disarmament regimes.

Why? The answer lies not just in the proliferation by rogue and other actors, but because of the unwillingness of nuclear weapons powers to play the game.

This can most notably be seen in the failure to adhere to the conditions attached to the NPT renewal in 1995 – the seven 'yardsticks' in terms of which the success of the implementation of the NPT could be judged.

Of these yardsticks, the Comprehensive Test Ban Treaty (CTBT) has been concluded, but still remains to be ratified by the US; the fissile material production ban remains deadlocked; the development of Nuclear Weapon Free Zones (NWFZ) remains stymied by wider tensions, particularly in the Middle East; over 50 states have not yet concluded IAEA safeguard agreements; and, arguably most important, there has been a less-than-determined pursuit by nuclear weapons powers to reduce and ultimately eliminate nuclear weapons.

The lack of progress in the yardsticks is, of course, related to a lack of progress in wider arms control and proliferation issues, including: the current deadlock in US-Russian arms control negotiations, the Indian and Pakistani nuclear tests in 1998, and the aforementioned ABM developments along with the proliferation of nuclear technologies to North Korea and Iraq. It is difficult to see a way forward for the NPT in the light of these developments.

CONCLUSION: WHAT NOW?

One critical question arises at this point: is the world a safer place with the NPT, however imperfect it may be?

I believe that the answer to this question has to be "Yes". The alternatives, such as a resort to bilateral pressure or even military intervention, lack the legitimacy of the NPT as a recognised legal non-proliferation control mechanism.

From this, three questions arise which I will leave with you:

First, how can the international community regain confidence in the global disarmament process?

A second, wider question, is how to encourage the US and other NWS to commit to the concept and ethos of multilateral politics – to lead by example?

Third, in the short-term, how can a collapse

of NPT at the 2000 Review Conference be prevented? Here, the onus principally rests on the NWS to provide an incentive (through disarmament) for adherence to the NPT for non-NWS – to bridge the divide between the "have's" and the "have-nots". South Africa, as at the 1995 conference, has an important role to play in creating common ground between the maximalist and minimalist positions on nuclear weapons disarmament.

I hope this seminar has provided us with some pointers on how to broaden the middle ground of the debate in the NPT within the grander objective of overall disarmament.

ENDNOTES

1) *Protect and Survive* was the title of a United Kingdom government booklet issued in the 1980s for the purposes of civil defence in the event of a nuclear attack.
2) On the extent of nuclear proliferation, see the Carnegie Endowment for International Peace on http://ceip.org/programs/npp/Numbers/number.htm. According to their latest statistics, the US possessed 12 070 warheads, Russia 22 500, China 400, France 450, UK 192, Israel between 70-80, India between 85-90 and Pakistan around 25. For details on the proliferation of and threat posed by biological weapons, see *Biological Terrorism, Emerging Diseases, and National Security*. New York: Rockefeller Brothers Fund, 1998.
3) See Mingquan Zhu, "US Plans on National Missile Defence and Theatre Missile Defence: A Chinese Perspective", *The Monitor: Non-Proliferation, Demilitarisation and Arms Control*, 5, 1-2, Winter-Spring 1999, p.21.
4) Cited in Robin Ranger and David Wiencek, *The Devil's Brews II: Weapons of Mass Destruction and International Security*. Lancaster: CDISS Bailrigg Memorandum 17, 1996, p.16.