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BETTER SAFE THAN SORRY

APPLYING THE PRECAUTIONARY PRINCIPLE TO ISSUES OF INTERNATIONAL SECURITY

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ABSTRACT

The strategic condition of the world is characterised by the fact that pre-emptive military action may be necessary. This condition is based on the realisation that legitimate national governments have lost their monopoly on the use of force while determined individuals and groups of individuals can lay their hands on weapons with which they can inflict huge, even irreversible damage to entire societies. Assuming that pre-emptive military action is here to stay and we should be determined not to let it escape democratic control. This paper seeks the procedures and checks that should be in place if pre-emptive military action is to be firmly embedded in democratic practices and institutions. To that end, it reviews the application of the precautionary principle in the environmental and food safety domains and assesses whether the procedural checks and practices used there can also have their utility in the international security domain.

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Introduction

The apparent problems of the administrations or President George W. Bush and Prime Minister Tony Blair to provide evidence legitimising the war in Iraq may erode public confidence in the role of the executive, one of the most important democratic institutions. When viewed in this light, the fallout from the war in Iraq may be as grave as the war itself. Yet, a strategic condition has developed in which pre-emptive military action may be necessary. This condition is based on the fact that legitimate national governments have *de facto* lost their 'monopoly on the use of force'. Today, determined individuals or groups can lay their hands on weapons with which they can inflict huge, even irreversible damage to entire societies. The purpose of this paper is not to engage in the debate about whether pre-emptive military action in itself is justified – we accept that in some cases pre-emptive military action is justified. Rather, we look at the procedures and checks that should be in place if pre-emptive military action is to be firmly embedded in democratic practices and institutions. To that end, we review the application of the precautionary principle used in the environmental and food safety domains and assess whether the procedural checks and practices applied there can also have their utility in the international security domain.

At first sight, this approach may seem implausible or unfeasible to some; nevertheless, we believe that it is supported by a number of good reasons. The application of the precautionary principle has become common ground in the European Union in recent years and is used in an increasing number of policy domains. A previous CEPS publication on the impact of the precautionary principle on international trade relations concludes that "precaution is here to stay" and urges that "[given] the nature of international economic interdependence (globalisation) and the linkages that exist between environmental and food safety issues, there is a pressing need to develop more extensive criteria for the application of precaution or the precautionary principle" (Woolcock, 2002, pp. 26-27). Other literature asserts that the precautionary principle provides the basis for "acting in advance of scientific proof of harm to address uncertain but potentially significant risks" (Jorden and O'Riordan, cited in Woolcock, 2002, p. 6). The precautionary principle may offer some interesting insights, because the food-safety domain and the security domain share an important similarity: the risks within these policy domains are uncertain to the point of being unknown. In both domains, risks and threats may constitute a danger to people and – if no action is taken or these threats are left unchecked - the danger may grow. This may result in a situation in which inaction may be a problematic, irresponsible policy option.

Yet the risks and threats in the security domain can result in much greater and more immediate harm for societies as a whole than most environmental issues, which makes observance of the precautionary principle, if anything, even more important. The purpose of the paper is to assess whether some of the positive effects of the application of the precautionary principle in the food-safety domain can be successfully applied to issues of international security. We subsequently elaborate upon the practice of the precautionary

principle and the concept of pre-emptive military action. By comparing the two 'practices', we hope to shed light on the issues mentioned above and provide some arguments that will answer the questions raised. The scope of this paper is limited, so it concludes with an agenda for further research.

The concept and practice of the precautionary principle

The precautionary principle is a key intellectual concept in the field of environmental studies. The European Commission has made it a key principle in its food safety programme. The precautionary principle is not really new. The essence of the principle is captured in commonsense aphorisms such as 'an ounce of prevention is worth a pound of cure', 'better safe than sorry' or 'look before you leap'. Consider the following quote from a recent Communication from the European Commission:

The Commission considers that the Community, like other WTO members, has the right to establish the level of protection – particularly of the environment, human, animal and plant health – that it deems appropriate. Applying the precautionary principle is a key tenet of its policy, and the choices it makes to this end will continue to affect the views it defends internationally, on how this principle should be applied (European Commission, 2000).

The precautionary principle or precautionary approach appears in various descriptions in treaties since the middle of the 1980s. The European Commission strives to protect the environment and human, animal or plant health. Accordingly, the Community has consistently endeavoured to achieve a high level of protection in these areas. Although the precautionary principle is not explicitly mentioned in the treaties except in the environmental field, its scope is far wider. It covers those specific circumstances where scientific evidence is insufficient, inconclusive or uncertain and there are indications through preliminary, objective scientific evaluation that there are reasonable grounds for concern that the potentially dangerous effects on the environment or human, animal or plant health may be inconsistent with the chosen level of protection (European Commission, 2000, p. 10). The precautionary principle can be applied (invoked) when an activity raises the threat of harm to human health or the environment. It is now an established practice that precautionary measures should be taken even if some of the inherent cause and effect relationships are not fully established scientifically (see Table 1). In this context, the proponent of an activity, rather than the public, should bear the bur den of proof.

Table 1. The 'precautionary principle' in some international treaties and agreements

The Montreal Protocol on Substances that deplete the Ozone Layer, 1987

"Parties to this protocol...determined to protect the ozone layer by taking **precautionary measures** to control equitably total global emissions of substances that deplete it..."

The Third North Sea Conference, 1990

"The participants...will continue to apply the **precautionary principle**, that is to take action to avoid the potentially damaging impacts of substances that are persistent, toxic and liable to bio accumulate even where there is no scientific evidence to prove a causal link between emissions and effects."

The Rio Declaration on Environment and Development, 1992

"In order to protect the environment the **Precautionary Approach** shall be widely applied by states according to their capabilities. Where there are threats of serious or irreversible damage, lack of full scientific certainty shall not be used as a reason for postponing cost-effective measures to prevent environmental degradation."

The Framework Convention on Climate Change, 1992

"The Parties should take **precautionary measures** to anticipate, prevent or minimise the causes of climate change and mitigate its adverse effects. Where there are no threats of serious or irreversible damage, lack of full scientific certainty should not be used as a reason for postponing such measures, taking into account that policies and measures to deal with climate change should be cost-effective so as to ensure global benefits at the lowest possible cost."

The Treaty on European Union (Maastricht Treaty), 1992

"Community policy on the environment...shall be based on the **precautionary principle** and on the principles that preventive actions should be taken, that the environmental damage should as a priority be rectified at the source and that the polluter should pay."

The Cartagena Protocol on Biosafety, 2000

"In accordance with the **precautionary approach** the objective of this Protocol is to contribute to ensuring an adequate level of protection in the field of the safe transfer, handling and use of living modified organisms resulting from modern biotechnology that may have adverse effects on the conservation and sustainable use of biological diversity, taking also into account risks to human health and specifically focusing on transboundary movements."

The Stockholm Convention on Persistent Organic Pollutants (POPs) 2001

Precaution, including transparency and public participation, is operationalised throughout the treaty, with explicit references in the preamble, the objective and the provisions for adding POPs and determination of best available technologies. The objective states: Mindful of the **Precautionary Approach** as set forth in Principle 15 of the Rio Declaration on Environment and Development, the objective of this Convention is to protect human health and the environment from persistent organic pollutants".

Source: European Environmental Agency (EEA), 2002.

The crucial question is *when* to invoke the precautionary principle. In the European Union, the European Commission – as guarantor of the treaties – can invoke the precautionary principle. The decision to do so should be based on formally established criteria in order to be transparent. The practice of precautionary action consists of four essential elements:

- 1. People have a duty to take anticipatory action to prevent harm. If there is a reasonable suspicion that something bad is going to happen, they have an obligation to try to stop it.
- 2. The burden of proving of the harmlessness of a new technology, process, activity or chemical lies with the proponents, not with the general public.
- 3. Before using a new technology, process or chemical, or starting a new activity, people have an obligation to examine 'a full range of alternatives' including the alternative of doing nothing.
- 4. Decisions applying the precautionary principle must be 'open, informed and democratic' and 'must include affected parties'.

It is up to the risk managers to decide if the precautionary principle should be invoked. In the European Union, the European Commission acts as the risk manager. It is, however, an eminently *political* responsibility to judge what an 'acceptable level of risk' is for society. Decision-makers who are faced with an unacceptable risk, scientific uncertainty or public concerns have a duty to find answers (see Box 1). In general, the precautionary principle should be considered within a structured approach to the analysis of risk that comprises three elements: risk assessment, risk management and risk communication. This principle is particularly relevant to the element of risk management. It consists of two quite distinct aspects or constituent parts: the first is the political decision to act or not to act, which is

linked to the factors triggering the recourse to the precautionary principle; and, if the decision to act is affirmative, the second aspect is how to act, i.e. the measures resulting from the application of the precautionary principle. These two elements are discussed in the sections that follow.

Box 1. Risk, uncertainty and ignorance

The precautionary principle is seen principally as a way to deal with a lack of scientific certainty. A basic foundation for our conclusions concerns the nature of scientific certainty itself. There is an urgent need for a more complete and systematic basis for thinking about the different ways in which scientific uncertainty may pervade regulatory appraisal. First, there is the familiar condition of **risk**, as formally defined in probability theory. This is where all possible outcomes are known in advance and where their relative likelihood can be adequately expressed as probabilities. Where this condition prevails, risk assessment is a valid technique that can save lives, prevent damage to the environment and provide a robust basis for decision-making. Still, the judgements over what is defined as at risk, and over the right balance to strike in decision-making, are necessarily laden with subjective assumptions and values.

Under the conditions of **uncertainty**, as formally defined, the adequate empirical or theoretical basis for assigning probabilities to outcomes does not exist. This may be because of the novelty of the activities concerned or because of the complexity or variability in their contexts. Either way, conventional risk assessment is too narrow in scope to be adequate for application under conditions of uncertainty. Although techniques such as safety factors, scenario or sensitivity analysis can be useful, they do not provide an adequate way to assess the impacts of different options. Here, more than ever, judgements about the right balance to strike in decision-making are laden with subjective assumptions and values. Often, decision-making is faced with the continual prospect of surprise – when some of the possibilities themselves remain unknown. This is the condition formally known as **ignorance**. Even more than uncertainty, this underscores the need for a healthy humility over the sufficiency of the available scientific knowledge and, crucially, for an institutional capacity for open reflection on the quality and utility of available bodies of knowledge. Once it is acknowledged that the likelihood of certain outcomes may not be fully quantifiable or that certain other possibilities may remain entirely unaddressed, then uncertainty and ignorance, rather than mere risk characterise the situation. The adoption of robust, transparent and accountable approaches towards the various aspects of risk, uncertainty and ignorance can be identified as one crucial means of regaining public confidence in regulatory decision-making.

Source: EEA (2002) with amendments by the author.

Triggers for a decision to invoke the precautionary principle

Once the scientific evaluation has been performed in the best possible way, it may provide a basis for triggering a decision to invoke the precautionary principle. The conclusions of this evaluation should show that the desired level of protection for the environment or a population group could be jeopardised. The precautionary principle is relevant only in the event of a potential risk, even if this risk cannot be fully demonstrated or quantified, nor its effects determined because of the insufficiency or inconclusive nature of the scientific data. The Commission has confirmed its wish to rely on procedures as transparent as possible and to involve all interested parties at the earliest stage. This will assist decision-makers in taking legitimate measures that are likely to achieve the society's chosen level of health or environmental protection. It should, however, be noted that the precautionary principle can, under no circumstances, be used to justify the adoption of arbitrary decisions. Concrete triggers are: the identification of potentially negative effects; scientific evaluation, comprising

a risk assessment; and scientific uncertainty. ¹ The appropriate response in a given situation is thus the result of a political decision, a function of the risk level that is 'acceptable' to the society on which the risk is imposed (European Commission, 2000, p. 16). The European Commission is convinced that measures based on the precautionary principle should comply with the basic principles for all other legislation. Where action is deemed necessary, measures based on the precautionary principle should be, inter alia:

- *proportional* to the chosen level of protection. The measure envisaged must make it possible to achieve the appropriate level of protection. Measures based on the precautionary principle must not be disproportionate to the desired level of protection nor aim at a zero-level of risk.
- *non-discriminatory* in their application. The principle of non-discrimination means that comparable situations should not be treated differently nor should different situations all be treated in the same way, unless there are objective grounds for doing so.
- *consistent* with the measures already adopted in similar circumstances or using similar approaches.
- based on an examination of the potential benefits and costs of action or lack of action. A comparison must be made between the most likely positive or negative consequences of the envisaged action with the consequences of inaction in terms of the overall cost to the Community, both in the long and short term. The measures envisaged must produce an overall advantage as regards to reducing risks to an acceptable level. Examination of the pros and cons cannot be reduced to an economic cost-benefit analysis. It is wider in scope and includes non-economic considerations.
- subject to review, in the light of new scientific data.
- capable of assigning responsibility for producing the scientific evidence necessary for a more comprehensive risk assessment (European Commission, 2000, p. 4).

The European Union Commissioner for Health, Mr. David Byrne, noted in an explanatory speech in 2000 on the precautionary principle in the food safety domain that,

The Commission's interest in this principle arises from its role as a risk manager. It had identified that the precautionary principle was evolving in different policy areas in such a manner that the principle itself was becoming misunderstood, leading to potential intentional or unintentional abuse...For the precautionary principle to be relevant, two preconditions have to be in place. The first precondition is that the potentially dangerous effects deriving from a phenomenon, product or process have been identified; the second precondition is that scientific evaluation does not allow the risk to be determined with sufficient certainty (Byrne, 2002).

But, as the commissioner made clear, the European Union is not seeking to create a risk-free society: "The European Commission does not believe that the precautionary principle is a substitute or excuse for seeking zero risk. Zero risk is rarely found, and in the vast majority of cases we are in the field of managing and controlling risk" (Byrne, 2002). A salient aspect of the risk management process by the European Commission is that the burden of proof has been inverted – it is not the Commission that has to prove the possible negative effects of a

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¹ A risk assessment usually consists of four elements: hazard identification, hazard characterisation, appraisal of exposure and risk characterisation. Scientific uncertainty is usually the sum of five parameters of the scientific method: the variable chosen, the measurements made, the samples drawn, the models used and the causal relationship employed. Scientific uncertainty may also arise from a controversy surrounding existing data or the lack of some relevant data.

food additive but it is the actor intending to bring it on the market who has to prove the absence of negative effects.

An inverse burden of proof

Community rules and those of many non-member countries enshrine the principle of prior approval before placing certain products, such as drugs, pesticides or food additives on the market. This is one way of applying the precautionary principle, by shifting responsibility for producing scientific evidence. This applies in particular to those substances deemed *a priori* hazardous or those that are potentially hazardous at a certain level of absorption. In this case the legislator, by way of precaution, has clearly reversed the burden of proof by requiring that the substances be deemed hazardous until proven otherwise. Hence, it is up to the business community to carry out the scientific work needed to evaluate the risk. As long as the human health risk cannot be evaluated with sufficient certainty, the legislator is not legally entitled to authorise use of the substance, unless exceptionally for test purposes. Measures based on the precautionary principle may assign responsibility for producing the scientific evidence necessary for a comprehensive risk evaluation. The decision-making procedure should be transparent and should involve all interested parties as early as possible and to the greatest reasonable extent. Not only has the burden of proof switched sides, the nature of the proof required has also changed in this application.

This concludes the brief overview of the precautionary principle. Further information and more detailed accounts are referenced in the bibliography. The next section of the paper considers the concept of pre-emptive military action, its key notions and concepts.

A new strategic condition

With the successful conclusion of the war in Iraq, a new, great, strategic debate has begun in earnest. After the debate over 'humanitarian' intervention in the 1990s, this decade will see a debate on the meaning and the practice of pre-emptive military action. In early 2002, President Bush ordered his national security team to rewrite the national security strategy so that it would justify initiating pre-emptive military campaigns against groups or nations that the President believes pose a threat of a future attack against America or its allies. This left many uncomfortable with the idea of President Bush giving himself *carte blanche* to make any military intervention he thinks necessary, without seeking outside approval. President Bush gave evidence of his position in a speech at the graduation exercise of West Point, the US top military institution, where he stated that he was not prepared to wait "too long" for a threat to materialise:

We cannot defend America and our friends by hoping for the best. We cannot put our faith in the word of tyrants, who solemnly sign non-proliferation treaties, and then systemically break them. If we wait for threats to fully materialize, we will have waited too long. The only path to safety is the path of action...Our security will require all Americans to be forward-looking and resolute, to be ready for preemptive action when necessary to defend our liberty and to defend our lives (President Bush, s peech at West Point Military Academy, 2002).

The idea of pre-emptive action is neither a new nor an alien concept to European governments. They apply the precautionary approach within their societies with vigour and imagination, as seen in the example of the extensive security precautions in force during EU summits, in which possible rioters are picked up pre-emptively (whether one approves of this practice is a different matter, the fact is that precautionary measures are being taken). The Netherlands has adopted a regulation that allows police officers to search individuals

preventively, that is, without formally being identified as a suspect. The attacks on America have made the new strategic condition very clear, which is the vulnerability of our societies coupled with the fact that determined individuals can obtain weapons with which they can inflict significant, irreversible or even existential damage to entire societies. It is the realisation of the vulnerability of our open and high-tech democracies and the scale of potential damage that can be inflicted upon them that forces governments on both sides of the Atlantic to re-think their options and responsibilities, along with how their actions must be embedded in existing beliefs, conventions and principles.

Pre-emption, prevention and anticipation

Michael Walzer develops the concept of 'anticipation' in international law in *Just and Unjust Wars* (1977). According to Walzer's account, 'Both individuals and states can rightfully defend themselves against violence that is imminent but not actual; they can fire the first shots if they know themselves about to be attacked. This is a right recognised in domestic law and also in the legalist paradigm for international society. In most legal accounts, however, it is severely restricted. Indeed, once one has stated the restrictions, it is no longer clear whether the right has any substance at all' (Walzer, 1977, p. 74). Walzer sketches a spectrum of anticipation: at one end, pre-emption is a reflex action, a raising of one's arms at the very last minute, in a necessary manner; at the other end it is preventive war, an attack that responds to a distant danger, in a manner that exercises foresight and free choice. Preventive war presupposes some standard against which danger is to be measured. This standard does not exist, except in the 'mind's eye'. In the words of Francis Bacon, "A just fear of an imminent danger, though no blow be given, is a lawful cause of war". Surely, in some instances it is simply stupid to wait for any other to inflict harm. In some cases, one has no other option than to protect oneself, when one can 'see it coming'.

With the proliferation of weapons of mass destruction (nuclear, biological or chemical) the chance that such a weapon will be used against innocent citizens has increased. Today the possible threats to our societies have risen to such a level that one wonders whether it is still acceptable. A threat results from someone's ability inflict harm and his/her intention to do so. The situation in which a country possesses the means to inflict enormous or even irreversible damage to national or regional stability, and whose intentions are unclear, is a huge problem. On the one hand we can sincerely ask whether we can afford to run the risk not to act, but on the other hand 'if the intention is unknown', military action cannot be justified. This makes the intelligence appreciation of the intention of a possible opponent increasingly important. At the same time there is an enormous risk of a politicisation of the intelligence appreciation. The reasons why the intention to harm must be 'manifest' is pointed out in the next section.

Hans Boutellier, a Dutch criminologist, comes to a similar conclusion in a recently published study, "Perhaps the most essential insight of the reaction to terror is the desire we may feel to understand the evil, but that we can hardly allow ourselves to do so. We cannot excuse it because the consequences are simply too great. It is this idea which is characteristic of the moral consciousness under post-modern conditions" (Boutellier, 2002, p. 13).

A historical precedent: the Six Day War

Walzer uses the Six Day War as a historical precedent to illustrate the concept of anticipation and concludes that the first Israeli strike was a clear case of legitimate anticipation. Actual fighting between Israel and Egypt began on 5 June 1967, after the first Israeli strike. In the early hours of the war, the Israelis did not acknowledge that they had sought the advantage of surprise, but the deception was not maintained. In fact, they believed themselves justified in

attacking first because of the dramatic events of the previous weeks. The Egyptians believed that the founding of Israel in 1948 had been unjust, that the state had no rightful existence and herce, that it could be attacked at any time. In a major speech on 29 May, President Gamal Abdel Nasser of Egypt announced that if war came, the Egyptian goal would be nothing less than the destruction of Israel. On 30 May, King Hussein of Jordan flew to Cairo to sign a treaty placing the Jordanian army under Egypt's command in event of war, thus associating himself with the Egyptian purpose. Syria had already agreed to such an arrangement and several days later Iraq joined the alliance. The Israelis struck on the day after the Iraqi announcement. There was a basic asymmetry in the structure of the opposing forces: the Egyptians could deploy their large army of long-term regulars on the Israeli border and keep it there indefinitely; the Israelis could only counter their deployment by mobilising reserve formations, though reservists could not be kept in uniform for very long. Egypt could therefore stay in a defensive position while Israel would have to attack unless the crisis was defused diplomatically.

The initial Israeli response was not as similarly determined as that of Egypt but, for domestic political reasons having to do in part with the democratic character of the state, was hesitant and confused. Israel's leaders sought a political resolution to the crisis, which they did not have the political strength or support to effect. Meanwhile, an intense fear spread throughout the country. Based on this example, Walzer (1997) establishes his precautionary axiom to international security wherein:

States may use military force in the face of threats of war, whenever failure to do so would seriously risk their territorial integrity or political independence...Under such circumstances it can fairly be said that they have been forced to fight and that they are the victims of aggression. Since there are no police upon whom they can call, the moment at which states are forced to fight probably comes sooner than it would for individuals in a settled domestic society. But if we imagine an unstable society, like the 'wild West' of American fiction, the analogy can be restated: a state under threat is like an individual hunted by an enemy who has announced his intention of killing or injuring him. Surely such a person may surprise his hunter, if he is able to do so...The line between legitimate and illegitimate first strike is not going to be drawn at the point of imminent attack but at the point of sufficient threat (Walzer, 1977, pp. 81-85).

An asymmetry in the structure of forces sets a time limit on diplomatic efforts that would have no relevance to conflicts involving other sorts of states and armies. There are threats with which no nation can be expected to tolerate. And that acknowledgement is an important part of our understanding of aggression (Walzer, 1977, p. 85).

Preconditions for pre-emptive military action

The line between a legitimate and an illegitimate first strike is not going to be drawn at the point of imminent attack but at the point of *sufficient threat*. Walzer uses this necessarily vague phrase to cover three things: a) a manifest intent to injure; b) a degree of active preparation that makes that intent a positive danger; and, c) a general situation in which waiting or doing anything other than fighting greatly magnifies the risk. It is impossible to specify the time span; it is the time span in which it is possible to feel threatened, within which one can still make choices. Wars undoubtedly have long political and moral prehistories. But anticipation needs to be understood within a narrower time frame.

In an article for *The New York Times* (17 June 2002), David Sanger develops four standards to which he intends to hold the US president accountable in case of a pre-emptive military strike (paraphrased):

- 1) The less the immediate and direct the threat is against America, the weaker the case is for pre-emptive military action. The administration must make it clear that force will be a last resort, not its principal anti-proliferation tool.
- 2) Whether the United States strikes first or retaliates, Congressional leaders of both parties should be consulted and listened to before military action is taken. Ideally, the president should ask for a vote of support from Congress. America's allies should also be consulted before any offensive military action.
- 3) The government must be prepared to justify any offensive attack on another country after it occurs. Both the nation and the world expect this, and they will judge the administration's actions on the quality of the proof it can assemble to show that something deadly was about to happen without immediate intervention.
- 4) It is difficult to think of any circumstance under which the United States could be justified in using any kind of nuclear weapon in a pre-emptive strike. While the administration may find it strategically important not to acknowledge that fact, nuclear weapons should never be regarded as just another bigger, more effective bomb.

Pre-emptive military action is problematic because the means have to be reconciled with the ends. Protecting democracy is an ultimate political concern and responsibility, but the way it is done is equally important. There are a number of legitimate concerns that can be voiced from a democratic perspective, including the transparency of the decision-making process, the justification of the &cision/action taken and the issue of the executive being accountable to the electorate. With regard to the precautionary principle, these concerns are met by a developed and detailed procedure that prescribes the application of the principle. As a matter of fact, the procedural aspect constitutes an essential characteristic of the legitimate use of the principle. Are these concerns relevant in the case of pre-emptive military action? We assert that they are, but there are a number of caveats that will be elaborated below. One issue is the element of surprise. This is clearly an important consideration in any military strike and this consideration could explain why no information is given before a pre-emptive military strike actually takes place. The issue is then whether the absence of information ex ante makes the obligation to give clear and unambiguous evidence ex post even more important, an obligation that should be respected at all times. If an administration conducts a pre-emptive strike, such a strike can only become legitimate on the basis of the evidence provided by the actor. The following sections highlight some of the similarities as well as some of the fundamental differences between the two policy practices of the precautionary principle and pre-emptive military action.

Precaution and pre-emption: similarities

Prima facie, a number of similarities exist between the precautionary principle and preemptive action. The aims of invoking the precautionary principle and the doctrine of preemptive military strike are the same – the defence or protection of a society and its citizens against an unknown danger. The application of the precautionary principle rests on three core conditions: a) regulatory inaction may lead to non-negligible harm; b) there is a lack of certainty as to the cause and effect relationship; and, c) under such circumstances, regulatory inaction is not justified (cf. Woolcock, 2002, p. 1). These three core conditions constitute the trigger of 'non-negligible risk'. The trigger for the application of the doctrine of pre-emptive military strike is 'sufficient threat' (Walzer, 2002). Pre-emptive military action is justified if

three core conditions are met: a) a manifest intention to harm; b) an active preparation; and, c) any course of action other than using force aggravates the risks disproportionately. The application of the precautionary principle and the concept of pre-emptive military action follow a similar pattern and result in a situation in which inaction is the problematic, even irresponsible course of action.

Some observers would claim that the risks operative in the security domain are of a fundamentally different nature and scope than those in the environmental domain. Countering that line of thinking, one should consider the similarities between 'bio-terror', which is clearly in the security realm, and 'bio-error', which is not in the security domain. It is easily conceivable that the fallout from both examples may be of the same apocalyptic scale. The spectrum of risks, threats and consequences for society are roughly the same for both policy domains. But there are fundamental differences too.

Precaution and pre-emption: fundamental differences

- 1) The nature of the (re-)action. The fundamental difference between the decision to invoke the precautionary principle and pre-emptive military action lies in the nature of the act. Invoking the precautionary principle is a regulatory act of governance. Resorting to pre-emptive military action is an act of sovereignty. The power to invoke the precautionary principle on behalf of the European Union is delegated to the European Commission, a non-elected body empowered to invoke such a principle. It also acts as Europe's prime risk manager, deciding on the acceptability of certain risk levels. With regard to pre-emptive military action, we speak of a military intervention against individuals or a regime in a non-member, sovereign country. Such an act constitutes, in international law (if not qualified), an act of aggression. In the US, only the president, as an elected official responsible to the people, can decide whether or not to strike pre-emptively, with or without the consent of Congress.
- 2) The level of proof. The European Environment Agency (EEA) study in 2002 differentiates among various levels of proof (see Table 2). The level the European Commission uses when applying the precautionary principle is the second least stringent. Nevertheless, it is (almost) evident that, if such a grave action as a pre-emptive military action is planned, the level of proof required can only be the most stringent, i.e. it must be 'waterproof'. If pre-emptive military action is considered, the information available must prove that the threat is 'beyond all reasonable doubt'. The quality of the evidence will directly affect the perceived legitimacy of the action. A critical problem is that there are no objective standards with which one can judge information. Deciding when information is 'beyond all reasonable doubt' is, in the case of the precautionary principle and the EU, it is a matter of scientific interpretation, and in the case of a pre-emptive military action, a matter of intelligence appreciation. This points directly back to Walzer's differentiation between justified and unjustified anticipatory military action. The difference between the two appears to lie exactly in the 'level of proof', i.e. in the former case the intentions are manifest (known beyond all reasonable doubt), in the latter these are unknown or uncertain.

Table 2. Different levels of proof for different purposes: some illustrations

Description	Examples	
'Beyond all reasonable doubt'	Criminal law; Swedish chemical law, 1973 (for evidence of	
	'safety' from manufacturers)	
'Balance of evidence'	Intergovernmental panel on climate change, 1995 and 2001	
'Reasonable grounds for concern'	European Commission Communication on the precautionary	
	principle	
'Scientific suspicion of risk'	Swedish chemical law, 1973, for the evidence required by	
	regulators to take precautionary action on the potential	
	harmful effects of substances	

Source: EEA, 2002.

- 3) The burden of proof. A key characteristic of the precautionary principle is that the burden of proof is inverted. The party proposing to introduce a food additive into the market is required to give evidence of risk levels. These parties are generally willing to comply and cooperate with the European Commission because they have an economic interest to do so. The European Commission has to be convinced of the absence of risk, as it represents a 'community of consumers'. In the case of pre-emptive military action, the burden of proof is with the actor contemplating the pre-emptive strike. The actor intending to strike must make it clear that the other party poses a sufficient threat, thus legitimising the action. The actor contemplating such pre-emptive action can ask the other party to give evidence of their intentions and capabilities, but these are often hard to verify, since "prudent rulers assume malign intentions" as Walzer noted. Nor can one expect the other party to be cooperative. Thus the burden of proof is with the actor engaging in the pre-emptive strike.
- 4) Ex ante versus ex post justification. In the application of the precautionary principle, the justification for invoking it is always given ex ante. Information is shared with all the parties involved and the decision is not only explained but the scientific evidence is presented, as is the weighing of the options. In the case of pre-emptive military action, the justification is likely to be given after the action has been executed. This is related to a point elaborated below: the element of surprise. When acting in a pre-emptive mode, surprise is considered to have a tactical advantage. There is no legal requirement obliging sovereign states to present evidence. But, as the previously quoted Sanger asserts, "The nation and the world...will judge the administration's actions on the quality of the proof it can assemble to show that something deadly was about to happen without immediate intervention" (Sanger, 2002). Counterintuitive as it may seem, the operational value of ex ante justification is perhaps even greater. It contributes to the legitimacy of the action and, if applied consistently, may have a deterring effect.

The trade-off between 'transparency' and 'surprise'

In the calculus of strategy, the transparency of a decision and the surprise that the decision is likely to generate are thought to be zero-sum related: the more open one is about ones intentions and possible decision, the less likely one is to surprise the opponent. By being transparent, one gives away an important tactical advantage. Although the element of surprise is an established principle of war, the Six Day War and the Iraq war have shown that the

² It was interesting to note that the US administration repeatedly challenged Saddam Hussein to prove the absence of any weapons of mass destruction and production facilities capable of producing WMDs in the lead -up to the Iraq war. As was expected, Saddam Hussein did not comply with US demands.

operational value of surprise is limited. Again, this may seem counter-intuitive, but the operational value of transparency is greater than one would expect. The operational/tactical value of transparency has both a direct and an indirect aspect. The direct aspect is its communicative value. As in deterrence, transparency – here understood as the disclosure of information coupled with the effective communication of an intention – can make a potential opponent or target of a pre-emptive military strike change his mind. The indirect aspect of transparency hinges on the obligation that the legitimacy of the operation must be established. In the case of the precautionary principle, this follows as a consequence from a correctly applied doctrine or procedure. We believe that this is operative in the case of pre-emptive military action too, wherein disclosing information to the public will convince it of the need to act and bolster support for pre-emptive action, rally international support and attract offers of assistance. A key question that arises is whether the element of surprise justifies the postponement of proof. Being fully transparent about one's intention to act may induce the required change of policy on the other side, without recourse to armed force.

'Maintaining' versus 'restoring' the status quo

Underlying both the precautionary principle and the practice of pre-emptive military action is the assumption of a status quo that carries an acceptable level of risk. In the case of the precautionary principle, when there is a threat that will increase the risk level, action is required. The precautionary principle is a sort of barrier that can be raised or a gate that can be closed in order to maintain the current level of risk in the status quo. This is different from the international security domain, where the risk level may increase factually (see Table 3). The risk level is also increased if a third party threatens harm. It is then up to the sovereign state to decide and act upon that information. In the international domain it is not possible to close any gates or raise any barriers beforehand. If a changed risk level is considered to be unacceptable, then action is required to redress the balance of risk and to restore the status quo.

Table 3. Maintaining versus restoring the status quo

	Risk level	Action	Status quo
Precautionary	May change in the future	Precautionary principle	Maintained
principle	(potentiality)	invoked	
Pre-emptive action	Has changed	Pre-emptive military action	Restored
	(factually or perceived)		

The precautionary principle and issues of international security

In the previous section, the fundamental differences between the precautionary principle and the doctrine of pre-emptive military action have been explained. Although the application of the precautionary principle to questions of international security falls short on at least two accounts, it is highly useful as a benchmark and analogy. First, there is the fact that the nature of precautionary measures and that of pre-emptive military action differs fundamentally: one is an act of governance and the other is an act of sovereignty. The former can be executed by any official mandated to do so, whereas the former can only be executed by an elected official. Secondly, the time of supplying the evidence to justify the action differs. The invocation of the precautionary principle is made legitimate through transparency and by the provision of information before the act is executed. Further, the demanding party, e.g. the food industry, has an economic interest to fully cooperate and will therefore do so Scientific evidence of threats and risks is concentrated in grey areas: we do not know the exact level of

risk and therefore we create a margin of safety in which the other party has to come up with evidence to prove that we need not worry.

In the instance of a pre-emptive military strike, however, the stakes are potentially higher. It may well be that a state is dealing with another state, groups or individuals that pose a very significant, even irreversible or existential threat to its society and citizens. The idea that the opponent potentially possesses the capability to inflict irreversible damage and that their intent is unknown immediately creates a very awkward situation. The element of surprise is often cited as crucial. In the example of Iraq, the element of surprise was completely lost – and it can be questioned whether this element was indeed that important. Perhaps, for longterm viability and survivability, it is better to give the proof ex ante. This has a deterring effect and may invite the party involved to cooperate. Whether 'sufficient threat' still requires a UN Security Council mandate is a critical question. Self-defence is a legitimate act by any sovereign state and requires no prior consent from the UN Security Council. Walzer used a spectrum to illustrate the different variations in which pre-emptive strikes originate: on the one extreme is an action that is a last moment reflex and on the other extreme is an action that is one of anticipated self-defence. In principle, sovereign states have the right to defend themselves; thus, the establishment of 'sufficient threat' is a sovereign decision. No UNmandate is therefore legally required prior to the action. Nevertheless, when a party has made the effort to obtain a UN Security Council mandate, the legitimacy of the action increases significantly.

The key threshold for both the application of the precautionary principle and the doctrine for a pre-emptive military strike is the legitimacy of the action. It is safe to state that neither preemptive military action nor the use of the precautionary principle inherently 'possesses' legitimacy. Legitimacy is always 'established' through a correct application, from which legitimacy follows as a consequence. However pedantic this may sound to legal experts, there is a certain value to making a distinction between acts that possess legitimacy and acts that must be made legitimate by the way in which they are carried out. The application of the precautionary principle is 'made' legitimate by presenting elaborate facts before the principle is invoked and by making the information available to all parties concerned (transparency). Invoking the precautionary principle per se is not legitimate. In the scenario of a pre-emptive strike, a single actor establishes the legitimacy of pre-emptive military action at one point or another. He or she perceives the triggering condition of 'sufficient threat' to have been met, which is a subjective condition ('in the mind's eye' as Walzer says). A pre-emptive military strike is never a priori legal or legitimate. The demands on an actor engaging in a pre-emptive strike must be severe. The actor must ex post 'make' his action legitimate by providing convincing evidence – beyond all reasonable doubt – after he has carried out the pre-emptive action. If he fails to do so, or fails to meet the acceptable level of proof, his act must be condemned as illegitimate and illegal by a representative international body, e.g. the UN Security Council.

A comparison between the precautionary principle and the doctrine of pre-emptive military strike is presented below in Table 4 To summarise, a fundamental difference between the two lies in the nature of the act: invoking the precautionary principle is an act of governance, whereas striking pre-emptively is an act of sovereignty. Further, the burden of proof, in the case of the precautionary principle is inverted and proof must be delivered *ex ante*. In the doctrine of pre-emption, the element of surprise is important; the burden of proof is with the administration but proof must be given *ex post* of the action. The key to the doctrine of a pre-emptive military strike is the notion of proving 'sufficient threat'. Two aspects of this notion are of crucial importance. First, the establishment of a sufficient threat as an objective fact is

very hard, perhaps even impossible to do. Risk may be in the eye of the beholder — 'if something is perceived to be real, it is real in its consequences' — thus if it is 'sufficient', it may provoke a reaction. Second, the predicament of our time is that states and individuals have the means to inflict such a level of harm that it may result in irreversible damage or instability to the international system. The situation in which one knows that another party possesses the means to inflict such damage but their intention is unknown, is problematic. Such a situation may be perceived to constitute so much threat that no other option is available except to take responsibility for self-protection and act pre-emptively. In that scenario, we witness a divergence between the 'unknown intention' and the 'manifest intention'. Whether a truly unknown intention conforms to the requirement of the highest level of proof is an interesting question.

Table 4. Overview of some of the differences and similarities between the precautionary principle and pre-emptive military action

	Precautionary principle	Pre-emptive military action	
Aim	Protection	Protection	
Constitutional obligation to protect?	The European Commission is the guarantor of the treaties.	The US president is obliged to defend the Constitution.	
Risk manager	The European Commission	The US president	
Who decides the 'acceptable'			
levels of risk and protection?			
The n ature of the action	An act of governance where the	An act of sovereignty possibly	
	national and European	requiring the consent of	
	Parliaments are not involved	Congress	
Burden of proof (ex ante)	The proponents of a new	The groups or nations	
	technology/food additive; they are	perceived as a threat/risk; they	
	likely to cooperate and have an	are highly unlikely to	
	economic interest to do so.	cooperate and have a political	
		interest not to do so.	
Burden of proof (ex post)	Not required	Required, by the acting	
		administration	
Level of proof	'Reasonable doubts for concern'	'Beyond all reasonable doubt'	
Trigger	Non-negligible risk	Sufficient threat	
Core conditions for	a) Regulatory inaction threatens	a) Manifest hostile intent;	
application :	to lead to non-negligible	b) Active preparation;	
	harm;	c) Action other than war that	
	b) A lack of certainty as to the	aggravates the risks	
	cause and effect relationship;	unacceptably.	
	c) Regulatory inaction is not		
	justified.		
Source	Scientific evaluation and	Intelligence appreciation of the	
	'uncertainty'	'threat'	
Transparency of the	Maximal	Unknown	
evaluation			
Operational criteria			
Proportional	Required	Unknown	
Non-discriminatory	Required	Difficult	
Consistent	Required	Difficult	
Cost-benefit analysis	Required	Likely	
Review mechanism	Required	Unknown	

Is 'double' accountability for pre-emptive military action required?

The supply of evidence before pre-emptive action commences has the strategic advantage of its deterrent effect and may invite the other party involved to cooperate. A pre-emptive military strike is a surprise attack on a country that will surprise not only the targeted country but may also surprise the allies of the actor. The information that triggers the action is highly classified and is only revealed after the action is completed to a limited number of friends, behind closed doors. The core of this action is the targeted application of force aimed at neutralising or destroying an opponent. A number of strict preconditions apply to the justification of this action:

- 1) Evidence supporting the need for precautionary intervention should be made public before the action is executed, as well as the decision that the threat posed is considered to constitute an unacceptable level of risk for the society and citizens involved. Although this is an executive decision, the consent of the national parliament should be sought.
- 2) The intention to execute a precautionary intervention should be clearly and unambiguously communicated to the target country, including a timeline and additional demands.
- 3) After the precautionary intervention is executed, a 'double' accountability is enforced, both to the parliament at home and to the international community at large, e.g. the Security Council of the United Nations. Legitimacy must be established, since it follows as a logical consequence from the proper application of the principle and the doctrine.

Pre-emptive military action can only be justified in those instances where an actor can supply convincing evidence for his/her action, before or after the action has taken place. This is a very important obligation because the issue of democratic accountability must be articulated and answered in each and every case. The point to be addressed here is whether this obligation changes if the information is supplied before or after the action. The obligation to open up the books after an action has been executed may be even more important than when the information is supplied beforehand. The difference is in the number of stakeholders directly and indirectly affected. If the information is only supplied after the action has taken place, one could then conceive of a requirement that we could call 'double' accountability: an obligation to account to the public at home (e.g. a national parliament) and a second obligation to account to the international community at large (e.g. the UN).

Is this a necessary, realistic and/or desirable demand? We argue that it is. It may well be the case that conducting a pre-emptive military attack without supplying adequate evidence of the threat is as shocking to the rule of international law (and indeed international stability) as genocide is. If the information – and the proof legitimising the action – can be made available only *ex post facto* (which is a realistic scenario), then double accountability is called for. If the information is made available before the action commences, this obligation is less clear. But in that situation the UN Security Council is likely to be involved and either will or will not support the action.

The one problem that will perhaps prove fatal is the demand for consistency. If the concept of precautionary intervention is not applied consistently, the deterrence effect will be negated and the actor may even lose his/her credibility. Finding ways to counter this pitfall is an important element of further research, but in reality it may be too wayward to conform to political rules and principles. One way forward is to agree to a procedure that embeds the use of precautionary measures in the security domain firmly in democratic structures and practices.

An agenda for further research

This paper has aimed at assessing whether the precautionary principle can be applied to questions of international security. So far, we have answered this question only in an indirect way. The conclusion now seems to be that the precautionary principle, as the European Union applies it in environmental and food safety regulations, cannot be applied to issues of international security. But, as previously stated, it is useful as a benchmark and an analogy. The comparison between the use of the precautionary principle and the use of pre-emptive military action has been very instructive because it enables us to see more clearly the democratic demands that must be met before, during and after the action. If one takes into account only the operational requirements, it is likely that the legitimacy of the action will be questionable. The surprising results are that the spectrum of risks in the environmental and food safety domain is of the same scale as those in the security domain. But precautionary action is an act of governance initiated by a bureaucracy, whereas pre-emptive military action is an act of sovereignty initiated by a democratically elected head of state. As stated in the introduction, the scope of this paper is limited, so it is confined to giving an overview of the issue and pointing out some of the key aspects. The issue addressed in this paper merits a full, book-length inquiry. The key questions in the debate concerning 'precautionary military measures' include:

- How does one determine whether and to what extent 'sufficient threat' exists?
- Assuming this is possible, what precautionary action is justified?
- How should the thresholds for risk and the costs of inaction be determined and who should make these decisions?
- How does risk management relate to or meet the demands of good governance?

As an afterthought, this outline of a research agenda on precautionary military measures may lead to some questions on precautionary action. Is it, for instance, ever possible or even desirable to leave risk management to a bureaucracy (e.g. the European Commission)? Shouldn't it be a principle of good governance that the decision on the acceptability of risks and threats be and remain a political act, taken only by those actors who are accountable, either directly to the electorate or to a democratically elected assembly of representatives?

Finally, there is, in our observation, a consensus among the US and Europe concerning two basic premises: 1) the exposure of the Western world, coupled with the scale of potential damage, may make governmental inaction in some instances irresponsible and unjustified; and 2) precautionary measures are here to stay. Tensions in transatlantic relations have arisen and will continue over the issues of who bears the burden of proof, the level of proof needed (before and after the operation has taken place) and the modalities of the intervention. If these tensions become unmanageable, a situation will develop in which the US will fight the fights that it wants to and Europe will fight the fights that it considers worthwhile. Only if both partners cooperate and inform each other of their intentions and actions does the Western world stand a chance of winning the war on terrorism.

REFERENCES

- Baker, James A. III (2002), "The right way to change Iraq's regime", *The International Herald Tribune*, 26 August.
- Bauman, Zygmunt (2002), Society under Siege, Cambridge: Polity Press.
- Boutellier, Hans (2002), De veiligheidsutopie. Hedendaags onbehagen en verlangen rond misdaad en straf, Den Haag: Boom Juridische uitgevers.
- Bush, President George W. (2002), Remarks by US President Bush at the 2002 graduation ceremony of the US military academy West Point, 1 June (retrieved from http://www.whitehouse.gov/news/releases/2002/06/print/20020601-3.htm).
- Byrne, David (2000), Address by Commissioner David Byrne on the Precautionary Principle in the domain of human health and food safety, 9 November (retrieved from http://www.europa.eu.int/comm/dgs/health_consumer/library/speeches/speech66en.html).
- Codex Alimentarius, (retrieved from http://www.codexalimentarius.net).
- European Commission (1999), White Paper on General Principles of Food Law in the European Union, COM(1999)719 final, Brussels.
- European Commission (2000), Communication on the Precautionary Principle, COM(2000)1, Brussels.
- European Environment Agency (2002), *Late lessons from early warnings: The precautionary principle 1896-2000*, Environmental Issue Report, No. 22, Earthscan Publications.
- International Commission on Intervention and State Sovereignty (2001), *The Responsibility to Protect*, December, International Development Research Centre, Canada.
- Jonas, Hans (1984), The Imperative of Responsibility, Chicago: University of Chicago Press.
- Kourilsky, Philippe and Geneviève Viney (1999), *Le Principe de Précaution*, Rapport au Premier Ministre, La Documentation Française, Editions Odile Jacob.
- Majone, Giandomenico (2002), 'What Price Safety? The Precautionary Principle and its Policy Implications', *Journal of Common Market Studies*, Volume 40(1), pp. 89-109.
- The New York Times, "When to Strike First", editorial, 17 June 2002.
- O'Riordan, Timothy, James Cameron and Andrew Jordon (eds) (2001), *Reinterpreting the Precautionary Principle*, London: Cameron May.
- Priest, Dana (2002), 'Iran Reactor may Test First-Strike Doctrine", *The International Herald Tribune*, 30 July.
- Sanger, David (2002), "Bush to Formalize a Defense Policy of Hitting First", *The New York Times*, 17 June.
- Wallace, Helen and William Wallace (2000), *Policy-Making in the European Union* (Fourth Edition), Oxford: Oxford University Press.
- Walzer, Michael (1977), Just and Unjust Wars. A Moral Argument with Historical Illustrations, New York: Basic Books.
- Woolcock, Stephen (2002), *The Precautionary Principle in the European Union & Its Impact on International Trade Relations*, report from the CEPS team on horizontal studies, CEPS, Brussels.
- World Trade Organisation (1995), Agreement on Sanitary and Phytosanitary Measures (SPS), Codex Alimentarius Commission.



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