

# Prominent US Physicists Call Nuclear Weapons against Iran Gravely Irresponsible

Letter to President Bush

By [Global Research](#)

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## **PROMINENT U.S. PHYSICISTS SEND LETTER TO PRESIDENT BUSH, CALL NUCLEAR WEAPONS AGAINST IRAN 'GRAVELY IRRESPONSIBLE'**

Thirteen of the nation's most prominent physicists have written a letter to President Bush, calling U.S. plans to reportedly use nuclear weapons against Iran "gravely irresponsible" and warning that such action would have "disastrous consequences for the security of the United States and the world."

The physicists include five Nobel laureates, a recipient of the National Medal of Science and three past presidents of the American Physical Society, the nation's preeminent professional society for physicists.

Their letter was prompted by recent articles in the Washington Post, New Yorker and other publications that one of the options being considered by Pentagon planners and the White House in a military confrontation with Iran includes the use of nuclear bunker busters against underground facilities. These reports were neither confirmed nor denied by White House and Pentagon officials.

The letter was initiated by Jorge Hirsch, a professor of physics at the University of California, San Diego, who last fall put together a petition signed by more than 1,800 physicists that repudiated new U.S. nuclear weapons policies that include preemptive use of nuclear weapons against non-nuclear adversaries (<http://physics.ucsd.edu/petition/>). Hirsch has also published 15 articles in recent months (<http://antiwar.com/hirsch/>) documenting the dangers associated with a potential U.S. nuclear strike on Iran.

"We are members of the profession that brought nuclear weapons into existence, and we feel strongly that it is our professional duty to contribute our efforts to prevent their misuse," says Hirsch. "Physicists know best about the devastating effects of the weapons they created, and these eminent physicists speak for thousands of our colleagues."

"The fact that the existence of this plan has not been denied by the Administration should be a cause of great alarm, even if it is only one of several plans being considered," he adds. "The public should join these eminent scientists in demanding that the Administration publicly renounces such a misbegotten option against a non-nuclear country like Iran."

The letter, which is available at <http://physics.ucsd.edu/petition/physicistsletter.html>, points

out that “nuclear weapons are unique among weapons of mass destruction,” and that nuclear weapons in today’s arsenals have a total power of more than 200,000 times the explosive energy of the bomb that leveled Hiroshima, which caused the deaths of more than 100,000 people.

It notes that there are no sharp lines between small and large nuclear weapons, nor between nuclear weapons targeting facilities and those targeting armies or cities, and that the use by the United States of nuclear weapons after 60 years of non-use will make the use of nuclear weapons by others more likely.

“Once the U.S. uses a nuclear weapon again, it will heighten the probability that others will too,” the physicists write. “In a world with many more nuclear nations and no longer a ‘taboo’ against the use of nuclear weapons, there will be a greatly enhanced risk that regional conflicts could expand into global nuclear war, with the potential to destroy our civilization.”

The letter echoes the main objection of last fall’s physicists’ petition, stressing that the Nuclear Non-Proliferation Treaty will be irreversibly damaged by the use or even the threat of use of nuclear weapons by a nuclear nation against a non-nuclear one, with disastrous consequences for the security of the United States and the world.

“It is gravely irresponsible for the U.S. as the greatest superpower to consider courses of action that could eventually lead to the widespread destruction of life on the planet. We urge the administration to announce publicly that it is taking the nuclear option off the table in the case of all non-nuclear adversaries, present or future, and we urge the American people to make their voices heard on this matter.”

The 13 physicists who coauthored the letter are: Philip Anderson, professor of physics at Princeton University and Nobel Laureate in Physics; Michael Fisher, professor of physics at the Institute for Physical Science and Technology, University of Maryland and Wolf Laureate in Physics; David Gross, professor of theoretical physics and director of the Kavli Institute of Physics at the University of California, Santa Barbara and Nobel Laureate in Physics; Jorge Hirsch, professor of physics at the University of California, San Diego; Leo Kadanoff, professor of physics and mathematics at the University of Chicago and recipient of the National Medal of Science; Joel Lebowitz, professor of mathematics and physics, Rutgers, The State University of New Jersey and Boltzmann Medalist; Anthony Leggett, professor of physics, University of Illinois at Urbana-Champaign and Nobel Laureate, Physics; Eugen Merzbacher, professor of physics, University of North Carolina at Chapel Hill and former president, American Physical Society; Douglas Osheroff, professor of physics and applied physics, Stanford University and Nobel Laureate, Physics; Andrew Sessler, former director of Lawrence Berkeley Laboratory and former president, American Physical Society; George Trilling, professor of physics, University of California, Berkeley, and former president, American Physical Society; Frank Wilczek, professor of physics, MIT and Nobel Laureate, Physics; Edward Witten, professor of physics, Institute for Advanced Study and Fields Medalist.

The physicists are sending copies of their letter to their elected representatives, requesting that the issue be urgently addressed in the U.S. Senate and House of Representatives.

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**April 17, 2006**  
**The Honorable George W. Bush**  
**President of the United States**  
**1600 Pennsylvania Avenue**  
**Washington, DC 20500**

Dear Mr. President:

Recent articles in the New Yorker and Washington Post report that the use of tactical nuclear weapons against Iran is being actively considered by Pentagon planners and by the White House. As members of the profession that brought nuclear weapons into existence, we urge you to refrain from such an action that would have grave consequences for America and for the world.

1800 of our fellow physicists have joined in a petition opposing new US nuclear weapons policies that open the door to the use of nuclear weapons in situations such as Iran's. These policies represent a "radical departure from the past", in the words of Linton Brooks, National Nuclear Security Administration director. Indeed, since the end of World War II, US policy has considered nuclear weapons "weapons of last resort", to be used only when the very survival of the nation or of an allied nation was at stake, or at most in cases of extreme military necessity. Instead, the new US nuclear weapons policies have significantly lowered the threshold for the potential use of nuclear weapons, as clearly evidenced by the fact that they are being considered as another tool in the toolbox to destroy underground installations that are "too deep" to be destroyed by conventional weapons. This is a major and dangerous shift in the rationale for nuclear weapons. In the words of the late Joseph Rotblat, Nobel Peace Prize recipient for his efforts to prevent nuclear war, "the danger of this policy can hardly be over-emphasized".

Nuclear weapons are unique among weapons of mass destruction: they unleash the enormous energy stored in the tiny nucleus of an atom, an energy that is a million times larger than that stored in the rest of the atom. The nuclear explosion releases an immense amount of blast energy and thermal and nuclear radiation, with deadly immediate and delayed effects on the human body. Over 100,000 human beings died in the Hiroshima blast, and nuclear weapons in today's arsenals have a total yield of over 200,000 Hiroshima bombs.

Using or even merely threatening to use a nuclear weapon preemptively against a nonnuclear adversary tells the 182 non-nuclear-weapon countries signatories of the Nuclear Non-Proliferation Treaty that their adherence to the treaty offers them no protection against a nuclear attack by a nuclear nation. Many are thus likely to abandon the treaty, and the nuclear non-proliferation framework will be damaged even further than it already has, with disastrous consequences for the security of the United States and the world. There are no sharp lines between small "tactical" nuclear weapons and large ones, nor between nuclear weapons targeting facilities and those targeting armies or cities. Nuclear weapons have not been used for 60 years. Once the US uses a nuclear weapon again, it will heighten the probability that others will too. In a world with many more nuclear nations and no longer a "taboo" against the use of nuclear weapons, there will be a greatly enhanced risk that regional conflicts could expand into global nuclear war, with the potential to destroy our civilization.

It is gravely irresponsible for the U.S. as the greatest superpower to consider courses of

action that could eventually lead to the widespread destruction of life on the planet. We urge you to announce publicly that the U.S. is taking the nuclear option off the table in the case of all nonnuclear adversaries, present or future, and we urge the American people to make their voices heard on this matter.

Sincerely,

**Philip Anderson, Michael Fisher, David Gross, Jorge Hirsch, Leo Kadanoff, Joel Lebowitz, Anthony Leggett, Eugen Merzbacher, Douglas Osheroff, Andrew Sessler, George Trilling, Frank Wilczek, Edward Witten.**

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