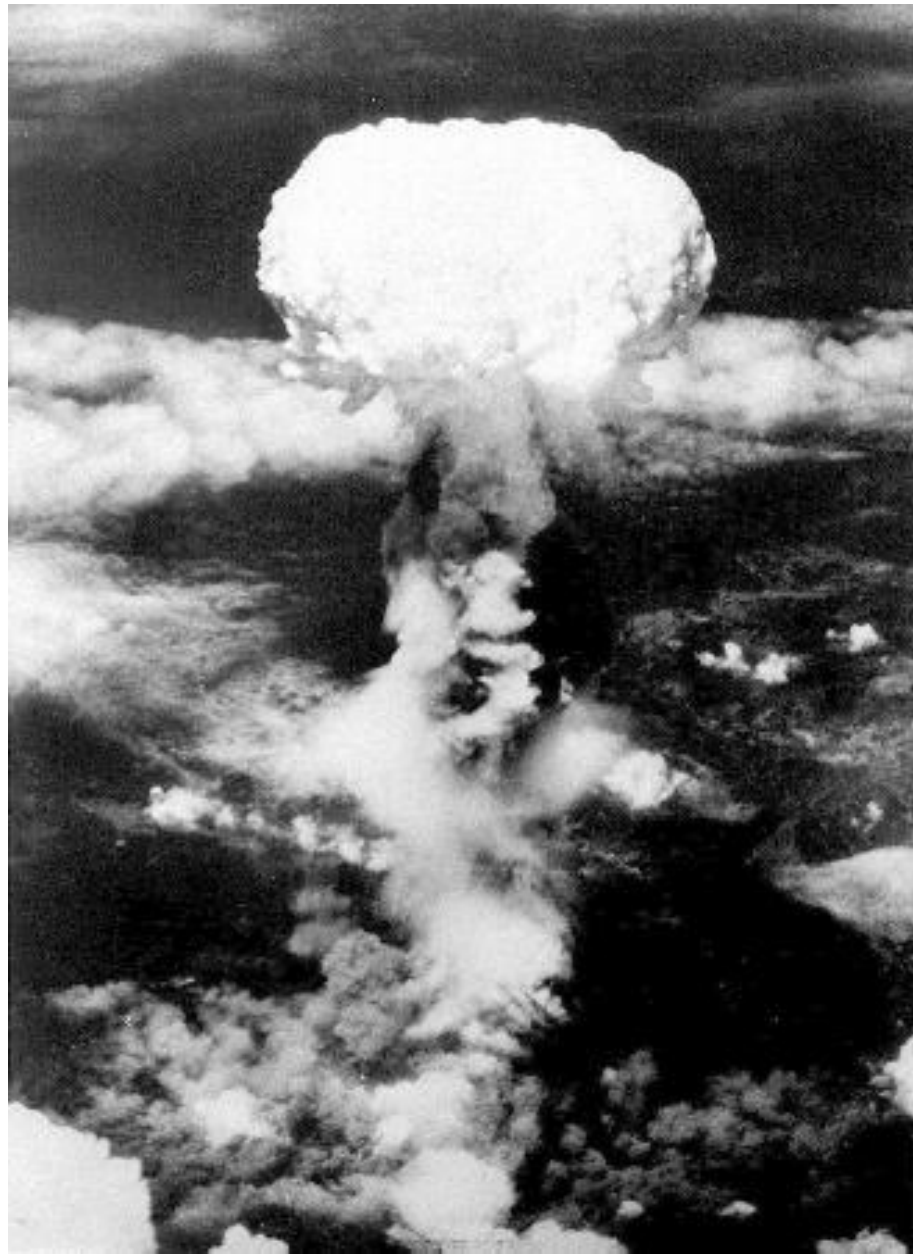


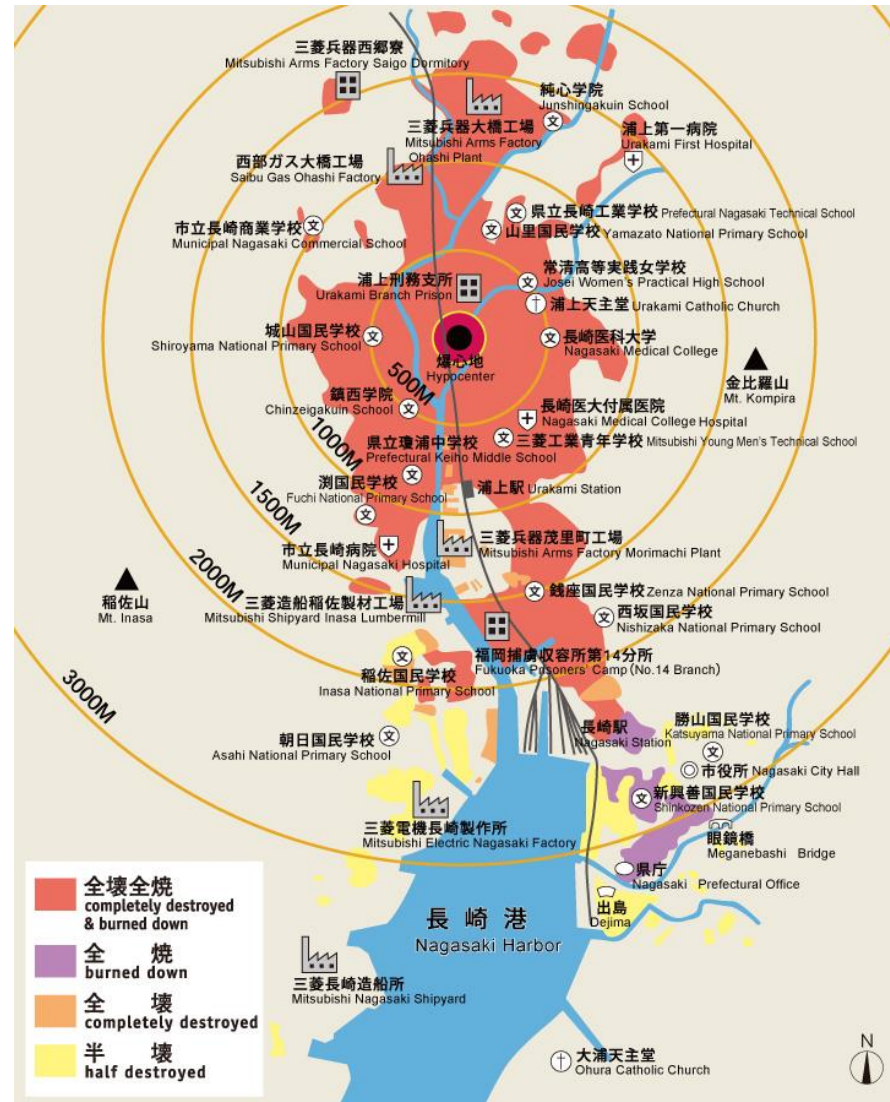
Toward a World without Nuclear Weapons Challenge of Nagasaki University

**Prof. Satoshi Hirose
Research Center for Nuclear Weapons
Abolition
Nagasaki University**



11:02 AM, 9th August 1945

Map of the physical damage caused by A-bomb



Around 70,000 lives lost

Effect of Atomic Bomb 1 *“Blast”*



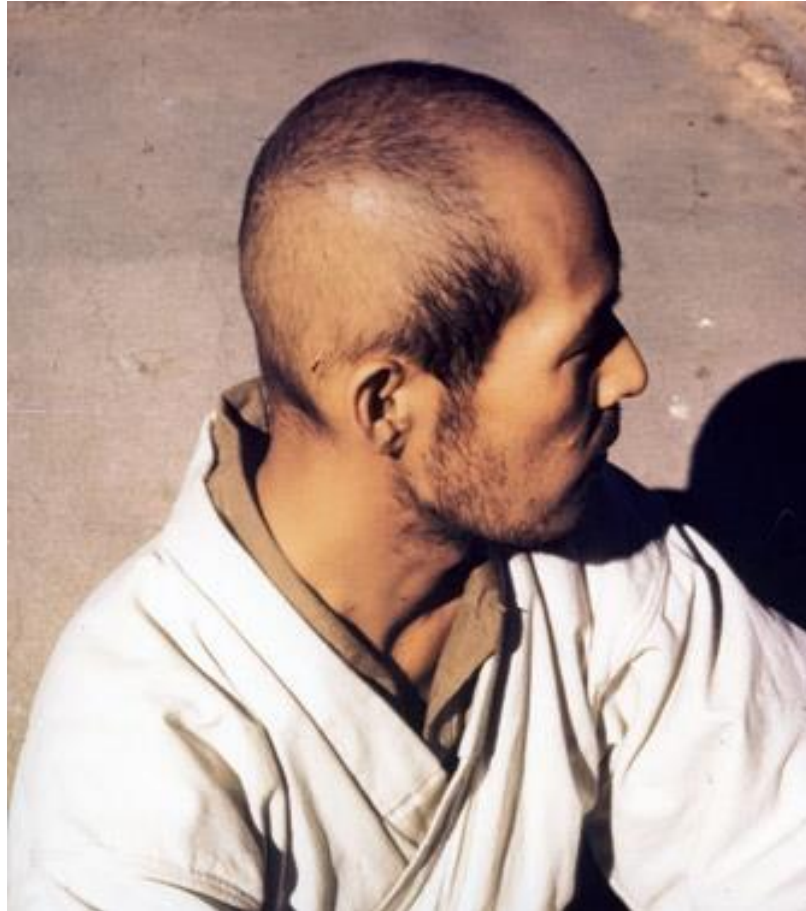
(Destroyed Urakami Cathedral)

Effect of Atomic Bomb 2 *"Heat"*



Melted Bottles

Effect of Atomic Bomb 3 *"Radiation"*



Diseases like Cancer, Leukemia, Chromosome abnormality



Destroyed buildings of Nagasaki Medical College
(Medical School of Nagasaki Univ.)



Destroyed factories of Mitsubishi
(currently main campus of Nagasaki Univ.)

Casualties among staff and students of Nagasaki Univ. caused by A-bomb

Medical College 897 killed

Teachers' College 55 killed

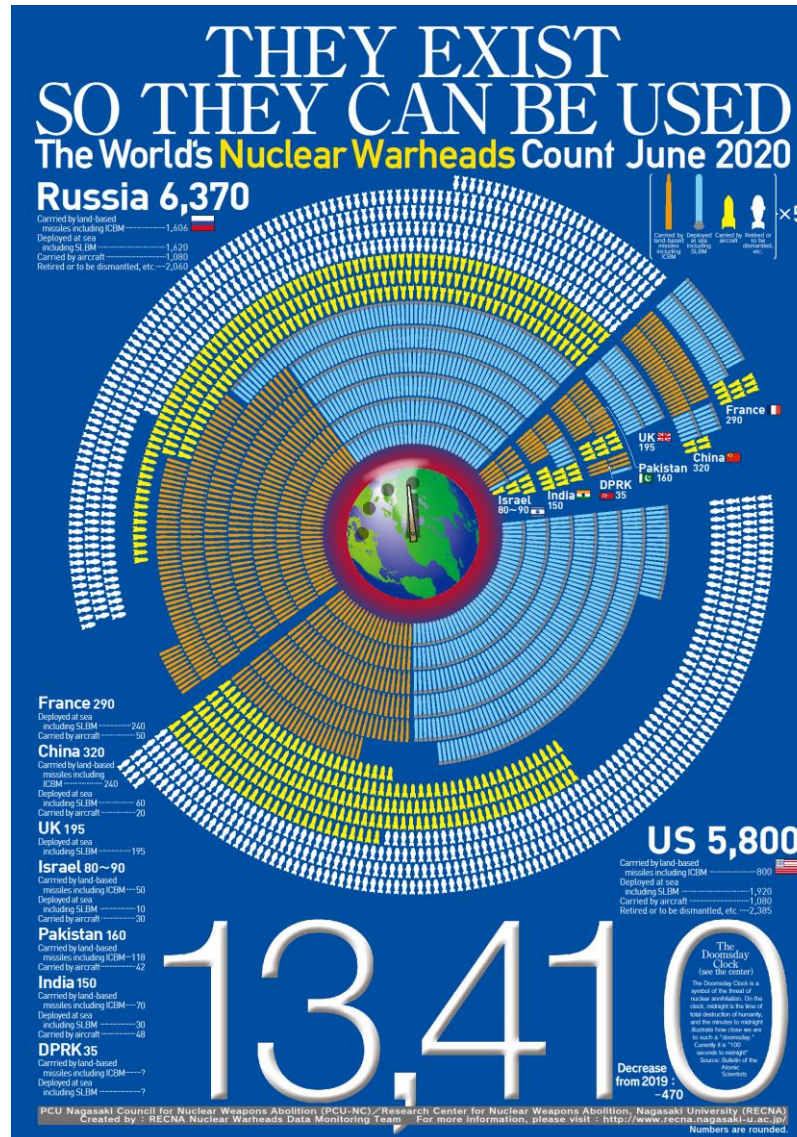
College of Economics 27 killed

Still, you can see in and around the campus



According to the official report submitted on August 12, 1945, about 300 people died, more than 1,200 people suffered severe injuries and more than 3,000 people suffered minor injuries.

We still have **13,410 Nuclear Warheads !**



Toward the World without Nuclear Weapons

Atrocity of Nuclear Weapons = Motivation of Disarmament = **Sensitivity:Necessity**

Denial of Value of Nuclear Weapons = Methods of Disarmament = **Reason:Possibility**

Two major projects of Nagasaki Univ. concerning A-bomb

Atomic Bomb Disease Institute (1962) : Medical treatment for survivors



Reality of damage by A-bomb = Sensitivity = Necessity

Research Center for Nuclear Weapons Abolition(RECNA) (2012)

: Analysis of Current Situation and Providing Policy Options



Theory of Nuclear Disarmament = Reason = Possibility



核兵器廃絶研究センター

RECNA

Research Center for Nuclear Weapons Abolition,
Nagasaki University

Major Works of RECNA

From Nagasaki to the World

- Research and Analysis on Nuclear Disarmament
- Education and Training on Nuclear Disarmament
- Implementing Outreach Programs

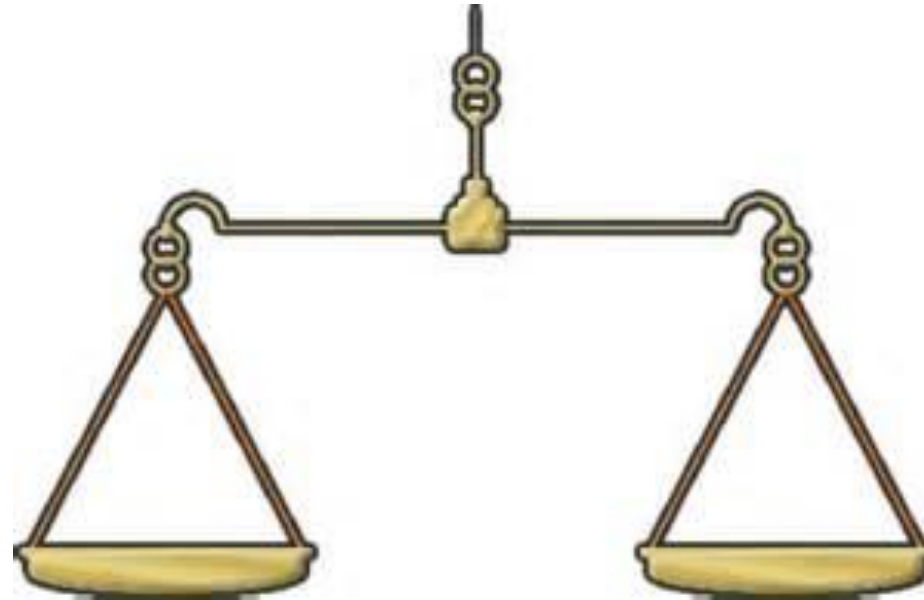
Research Theme 1 of RENA

Effective Theory for Nuclear Disarmament

Light



National Security



Humanitarian
Consideration



Heavy

Military Power to Protect Country from Possible Attacks



Military Power to Deter Possible Attacks



Deterrence

Nuclear Weapons



Most Powerful Weapons in the World



Most Powerful Deterrence ?

Fundamental Contradiction in Deterrence

Distrust: Possible Military Attack



Trust: Logical Assessment

Research theme 2 of RECNA

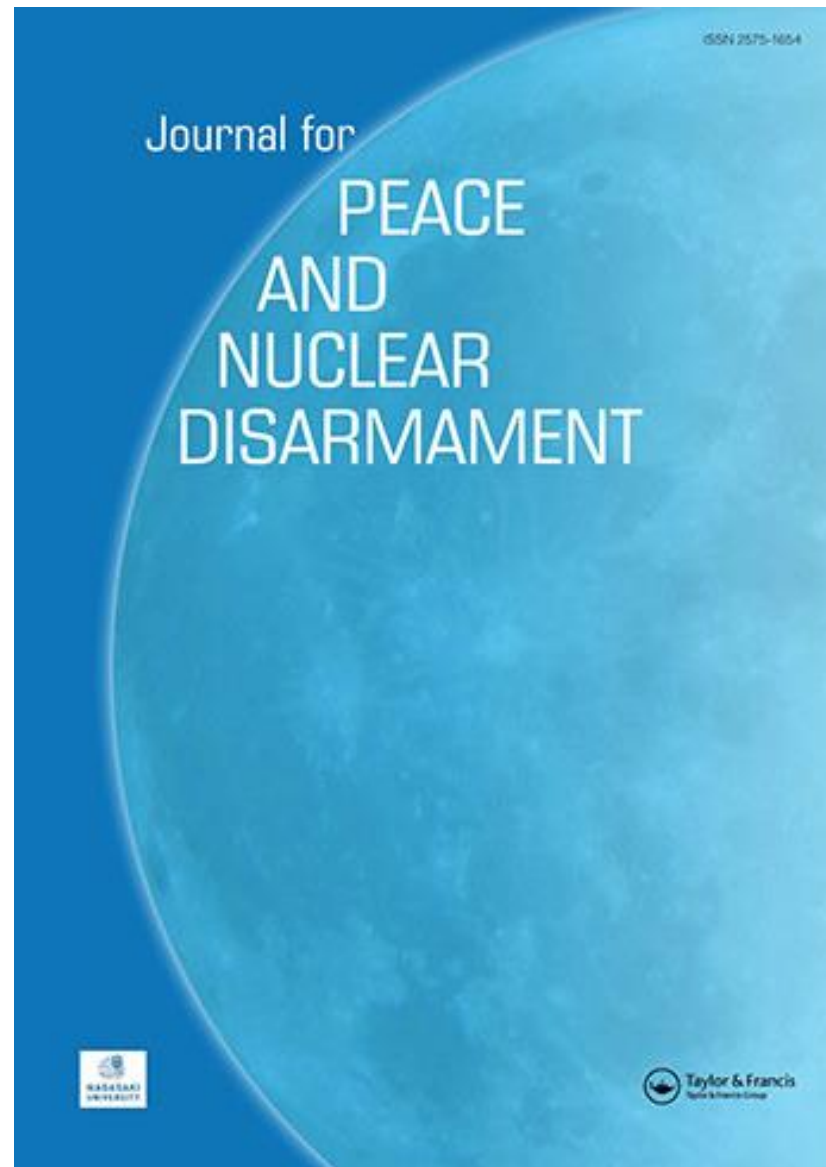
Northeast Asia Nuclear Weapons Free Zone



The 3rd Panel on Peace and Security of Northeast Asia (PSNA) Workshop in Moscow, 31 May 2018



The 3rd Panel on Peace and Security of Northeast Asia (PSNA) Workshop in Moscow, 31 May 2018



Publication of *Journal for Peace and Nuclear Disarmament*

Education and Training on Nuclear Disarmament

- 1) Offering classes on Nuclear Disarmament: undergraduate classes and graduate school
- 2) Training the Nagasaki Youth Delegation
- 3) Providing assistance to local elementary and high schools



The Nagasaki Youth Delegation members with H.E. Ambassador Syed Mohamad Hasrin Syed Hussin (Malaysia), Chairperson of the Third Preparatory Committee for 2020 NPT Review Conference (Nagasaki Univ. July 11 2019)

Implementing outreach programs

- 1) Convening open seminars, lectures and symposiums
- 2) Providing web-based user friendly data base on nuclear issues
- 3) Publishing Newsletters, Reports and Policy Papers



A scene from Open Seminar for Citizens

A large, white, billowing mushroom cloud from a nuclear explosion rises against a clear blue sky. The cloud has a thick, dark stem and a large, rounded, white top. The background is a deep blue sky with some lighter, wispy clouds near the horizon.

**Nuclear Weapons are
Not
“Necessary Evil”
But
“Absolute Evil”**