

LAMPIRAN

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Minamata Convention on Mercury article 1-6

Sumber : The Minamata Convention Website

Minamata Convention on Mercury

The Parties to this Convention,

Recognizing that mercury is a chemical of global concern owing to its long-range atmospheric transport, its persistence in the environment once anthropogenically introduced, its ability to bioaccumulate in ecosystems and its significant negative effects on human health and the environment,

Recalling decision 25/5 of 20 February 2009 of the Governing Council of the United Nations Environment Programme to initiate international action to manage mercury in an efficient, effective and coherent manner,

Recalling paragraph 221 of the outcome document of the United Nations Conference on Sustainable Development “The future we want”, which called for a successful outcome of the negotiations on a global legally binding instrument on mercury to address the risks to human health and the environment,

Recalling the United Nations Conference on Sustainable Development’s reaffirmation of the principles of the Rio Declaration on Environment and Development, including, *inter alia*, common but differentiated responsibilities, and acknowledging States’ respective circumstances and capabilities and the need for global action,

Aware of the health concerns, especially in developing countries, resulting from exposure to mercury of vulnerable populations, especially women, children, and, through them, future generations,

Noting the particular vulnerabilities of Arctic ecosystems and indigenous communities because of the biomagnification of mercury and contamination of traditional foods, and concerned about indigenous communities more generally with respect to the effects of mercury,

Recognizing the substantial lessons of Minamata Disease, in particular the serious health and environmental effects resulting from the mercury pollution, and the need to ensure proper management of mercury and the prevention of such events in the future,

Stressing the importance of financial, technical, technological, and capacity-building support, particularly for developing countries, and countries with economies in transition, in order to strengthen national capabilities for the management of mercury and to promote the effective implementation of the Convention,

Recognizing also the activities of the World Health Organization in the protection of human health related to mercury and the roles of relevant multilateral environmental agreements, especially the Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and Their Disposal and the Rotterdam Convention on the Prior Informed Consent Procedure for Certain Hazardous Chemicals and Pesticides in International Trade,

Recognizing that this Convention and other international agreements in the field of the environment and trade are mutually supportive,

Emphasizing that nothing in this Convention is intended to affect the rights and obligations of any Party deriving from any existing international agreement,

Understanding that the above recital is not intended to create a hierarchy between this Convention and other international instruments,

Noting that nothing in this Convention prevents a Party from taking additional domestic measures consistent with the provisions of this Convention in an effort to protect human health and the environment from exposure to mercury in accordance with that Party's other obligations under applicable international law,

Have agreed as follows:

Article 1

Objective

The objective of this Convention is to protect the human health and the environment from anthropogenic emissions and releases of mercury and mercury compounds.

Article 2

Definitions

For the purposes of this Convention:

- (a) "Artisanal and small-scale gold mining" means gold mining conducted by individual miners or small enterprises with limited capital investment and production;
- (b) "Best available techniques" means those techniques that are the most effective to prevent and, where that is not practicable, to reduce emissions and releases of mercury to air, water and land and the impact of such emissions and releases on the environment as a whole, taking into account economic and technical considerations for a given

Party or a given facility within the territory of that Party.

In this context:

- (i) “Best” means most effective in achieving a high general level of protection of the environment as a whole;
 - (ii) “Available” techniques means, in respect of a given Party and a given facility within the territory of that Party, those techniques developed on a scale that allows implementation in a relevant industrial sector under economically and technically viable conditions, taking into consideration the costs and benefits, whether or not those techniques are used or developed within the territory of that Party, provided that they are accessible to the operator of the facility as determined by that Party; and
 - (iii) “Techniques” means technologies used, operational practices and the ways in which installations are designed, built, maintained, operated and decommissioned;
- (c) “Best environmental practices” means the application of the most appropriate combination of environmental control measures and strategies;
- (d) “Mercury” means elemental mercury (Hg(0), CAS No. 7439-97-6);
- (e) “Mercury compound” means any substance consisting of atoms of mercury and one or more atoms of other chemical elements that can be separated into different components only by chemical reactions;

- (f) “Mercury-added product” means a product or product component that contains mercury or a mercury compound that was intentionally added;
- (g) “Party” means a State or regional economic integration organization that has consented to be bound by this Convention and for which the Convention is in force;
- (h) “Parties present and voting” means Parties present and casting an affirmative or negative vote at a meeting of the Parties;
- (i) “Primary mercury mining” means mining in which the principal material sought is mercury;
- (j) “Regional economic integration organization” means an organization constituted by sovereign States of a given region to which its member States have transferred competence in respect of matters governed by this Convention and which has been duly authorized, in accordance with its internal procedures, to sign, ratify, accept, approve or accede to this Convention; and
- (k) “Use allowed” means any use by a Party of mercury or mercury compounds consistent with this Convention, including, but not limited to, uses consistent with Articles 3, 4, 5, 6 and 7.

Article 3

Mercury supply sources and trade

1. For the purposes of this Article:
 - (a) References to “mercury” include mixtures of mercury with other substances, including alloys of mercury, with a mercury concentration of at least 95 per cent by weight; and

- (b) “Mercury compounds” means mercury (I) chloride (known also as calomel), mercury (II) oxide, mercury (II) sulphate, mercury (II) nitrate, cinnabar and mercury sulphide.
- 2. The provisions of this Article shall not apply to:
 - (a) Quantities of mercury or mercury compounds to be used for laboratory-scale research or as a reference standard; or
 - (b) Naturally occurring trace quantities of mercury or mercury compounds present in such products as non-mercury metals, ores, or mineral products, including coal, or products derived from these materials, and unintentional trace quantities in chemical products; or
 - (c) Mercury-added products.
- 3. Each Party shall not allow primary mercury mining that was not being conducted within its territory at the date of entry into force of the Convention for it.
- 4. Each Party shall only allow primary mercury mining that was being conducted within its territory at the date of entry into force of the Convention for it for a period of up to fifteen years after that date. During this period, mercury from such mining shall only be used in manufacturing of mercury-added products in accordance with Article 4, in manufacturing processes in accordance with Article 5, or be disposed in accordance with Article 11, using operations which do not lead to recovery, recycling, reclamation, direct re-use or alternative uses.
- 5. Each Party shall:

(a) Endeavour to identify individual stocks of mercury or mercury compounds exceeding 50 metric tons, as well as sources of mercury supply generating stocks exceeding 10 metric tons per year, that are located within its territory;

(b) Take measures to ensure that, where the Party determines that excess mercury from the decommissioning of chlor-alkali facilities is available, such mercury is disposed of in accordance with the guidelines for environmentally sound management referred to in paragraph 3 (a) of Article 11, using operations that do not lead to recovery, recycling, reclamation, direct re-use or alternative uses.

6. Each Party shall not allow the export of mercury except:

(a) To a Party that has provided the exporting Party with its written consent, and only for the purpose of:

(i) A use allowed to the importing Party under this Convention; or

(ii) Environmentally sound interim storage as set out in Article 10; or

(b) To a non-Party that has provided the exporting Party with its written consent, including certification demonstrating that:

(i) The non-Party has measures in place to ensure the protection of human health and the environment

and to ensure its compliance with the provisions of Articles 10 and 11; and

- (ii) Such mercury will be used only for a use allowed to a Party under this Convention or for environmentally sound interim storage as set out in Article 10.

7. An exporting Party may rely on a general notification to the Secretariat by the importing Party or non-Party as the written consent required by paragraph 6. Such general notification shall set out any terms and conditions under which the importing Party or non-Party provides its consent. The notification may be revoked at any time by that Party or non-Party. The Secretariat shall keep a public register of all such notifications.
8. Each Party shall not allow the import of mercury from a non-Party to whom it will provide its written consent unless the non-Party has provided certification that the mercury is not from sources identified as not allowed under paragraph 3 or paragraph 5 (b).
9. A Party that submits a general notification of consent under paragraph 7 may decide not to apply paragraph 8, provided that it maintains comprehensive restrictions on the export of mercury and has domestic measures in place to ensure that imported mercury is managed in an environmentally sound manner. The Party shall provide a notification of such decision to the Secretariat, including information describing its export restrictions and domestic regulatory measures, as well as information on the quantities and countries of origin of mercury imported from non-Parties. The Secretariat shall maintain a public register of all such

notifications. The Implementation and Compliance Committee shall review and evaluate any such notifications and supporting information in accordance with Article 15 and may make recommendations, as appropriate, to the Conference of the Parties.

10. The procedure set out in paragraph 9 shall be available until the conclusion of the second meeting of the Conference of the Parties. After that time, it shall cease to be available, unless the Conference of the Parties decides otherwise by simple majority of the Parties present and voting, except with respect to a Party that has provided a notification under paragraph 9 before the end of the second meeting of the Conference of the Parties.
11. Each Party shall include in its reports submitted pursuant to Article 21 information showing that the requirements of this Article have been met.
12. The Conference of the Parties shall at its first meeting provide further guidance in regard to this Article, particularly in regard to paragraphs 5 (a), 6 and 8, and shall develop and adopt the required content of the certification referred to in paragraphs 6 (b) and 8.
13. The Conference of the Parties shall evaluate whether the trade in specific mercury compounds compromises the objective of this Convention and consider whether specific mercury compounds should, by their listing in an additional annex adopted in accordance with Article 27, be made subject to paragraphs 6 and 8.

Article 4

Mercury-added products

1. Each Party shall not allow, by taking appropriate measures, the manufacture, import or export of mercury-added products listed in Part I of Annex A after the phase-out date specified for those products, except where an exclusion is specified in Annex A or the Party has a registered exemption pursuant to Article 6.

2. A Party may, as an alternative to paragraph 1, indicate at the time of ratification or upon entry into force of an amendment to Annex A for it, that it will implement different measures or strategies to address products listed in Part I of Annex A. A Party may only choose this alternative if it can demonstrate that it has already reduced to a de minimis level the manufacture, import, and export of the large majority of the products listed in Part I of Annex A and that it has implemented measures or strategies to reduce the use of mercury in additional products not listed in Part I of Annex A at the time it notifies the Secretariat of its decision to use this alternative. In addition, a Party choosing this alternative shall:
 - (a) Report at the first opportunity to the Conference of the Parties a description of the measures or strategies implemented, including a quantification of the reductions achieved;

 - (b) Implement measures or strategies to reduce the use of mercury in any products listed in Part I of Annex A for which a de minimis value has not yet been obtained;

- (c) Consider additional measures to achieve further reductions; and
- (d) Not be eligible to claim exemptions pursuant to Article 6 for any product category for which this alternative is chosen.

No later than five years after the date of entry into force of the Convention, the Conference of the Parties shall, as part of the review process under paragraph 8, review the progress and the effectiveness of the measures taken under this paragraph.

3. Each Party shall take measures for the mercury-added products listed in Part II of Annex A in accordance with the provisions set out therein.
4. The Secretariat shall, on the basis of information provided by Parties, collect and maintain information on mercury-added products and their alternatives, and shall make such information publicly available. The Secretariat shall also make publicly available any other relevant information submitted by Parties.
5. Each Party shall take measures to prevent the incorporation into assembled products of mercury-added products the manufacture, import and export of which are not allowed for it under this Article.
6. Each Party shall discourage the manufacture and the distribution in commerce of mercury-added products not covered by any known use of mercury-added products prior to the date of entry

into force of the Convention for it, unless an assessment of the risks and benefits of the product demonstrates environmental or human health benefits. A Party shall provide to the Secretariat, as appropriate, information on any such product, including any information on the environmental and human health risks and benefits of the product. The Secretariat shall make such information publicly available.

7. Any Party may submit a proposal to the Secretariat for listing a mercury-added product in Annex A, which shall include information related to the availability, technical and economic feasibility and environmental and health risks and benefits of the non-mercury alternatives to the product, taking into account information pursuant to paragraph 4.
8. No later than five years after the date of entry into force of the Convention, the Conference of the Parties shall review Annex A and may consider amendments to that Annex in accordance with Article 27.
9. In reviewing Annex A pursuant to paragraph 8, the Conference of the Parties shall take into account at least:
 - (a) Any proposal submitted under paragraph 7;
 - (b) The information made available pursuant to paragraph 4;
and
 - (c) The availability to the Parties of mercury-free alternatives that are technically and economically

feasible, taking into account the environmental and human health risks and benefits.

Article 5

Manufacturing processes in which mercury or mercury compounds are used

1. For the purposes of this Article and Annex B, manufacturing processes in which mercury or mercury compounds are used shall not include processes using mercury-added products, processes for manufacturing mercury-added products or processes that process mercury-containing waste.
2. Each Party shall not allow, by taking appropriate measures, the use of mercury or mercury compounds in the manufacturing processes listed in Part I of Annex B after the phase-out date specified in that Annex for the individual processes, except where the Party has a registered exemption pursuant to Article 6.
3. Each Party shall take measures to restrict the use of mercury or mercury compounds in the processes listed in Part II of Annex B in accordance with the provisions set out therein.
4. The Secretariat shall, on the basis of information provided by Parties, collect and maintain information on processes that use mercury or mercury compounds and their alternatives, and shall make such information publicly available. Other relevant information may also be submitted by Parties and shall be made publicly available by the Secretariat.

5. Each Party with one or more facilities that use mercury or mercury compounds in the manufacturing processes listed in Annex B shall:
 - (a) Take measures to address emissions and releases of mercury or mercury compounds from those facilities;
 - (b) Include in its reports submitted pursuant to Article 21 information on the measures taken pursuant to this paragraph; and
 - (c) Endeavour to identify facilities within its territory that use mercury or mercury compounds for processes listed in Annex B and submit to the Secretariat, no later than three years after the date of entry into force of the Convention for it, information on the number and types of such facilities and the estimated annual amount of mercury or mercury compounds used in those facilities. The Secretariat shall make such information publicly available.
6. Each Party shall not allow the use of mercury or mercury compounds in a facility that did not exist prior to the date of entry into force of the Convention for it using the manufacturing processes listed in Annex B. No exemptions shall apply to such facilities.
7. Each Party shall discourage the development of any facility using any other manufacturing process in which mercury or mercury compounds are intentionally used that did not exist

prior to the date of entry into force of the Convention, except where the Party can demonstrate to the satisfaction of the Conference of the Parties that the manufacturing process provides significant environmental and health benefits and that there are no technically and economically feasible mercury-free alternatives available providing such benefits.

8. Parties are encouraged to exchange information on relevant new technological developments, economically and technically feasible mercury-free alternatives, and possible measures and techniques to reduce and where feasible to eliminate the use of mercury and mercury compounds in, and emissions and releases of mercury and mercury compounds from, the manufacturing processes listed in Annex B.
9. Any Party may submit a proposal to amend Annex B in order to list a manufacturing process in which mercury or mercury compounds are used. It shall include information related to the availability, technical and economic feasibility and environmental and health risks and benefits of the non-mercury alternatives to the process.
10. No later than five years after the date of entry into force of the Convention, the Conference of the Parties shall review Annex B and may consider amendments to that Annex in accordance with Article 27.
11. In any review of Annex B pursuant to paragraph 10, the Conference of the Parties shall take into account at least:
 - (a) Any proposal submitted under paragraph 9;

- (b) The information made available under paragraph 4; and
- (c) The availability for the Parties of mercury-free alternatives which are technically and economically feasible taking into account the environmental and health risks and benefits.

Article 6

Exemptions available to a Party upon request

1. Any State or regional economic integration organization may register for one or more exemptions from the phase-out dates listed in Annex A and Annex B, hereafter referred to as an “exemption”, by notifying the Secretariat in writing:
 - (a) On becoming a Party to this Convention; or
 - (b) In the case of any mercury-added product that is added by an amendment to Annex A or any manufacturing process in which mercury is used that is added by an amendment to Annex B, no later than the date upon which the applicable amendment enters into force for the Party.

Any such registration shall be accompanied by a statement explaining the Party’s need for the exemption.

2. An exemption can be registered either for a category listed in Annex A or B or for a sub-category identified by any State or regional economic integration organization.

3. Each Party that has one or more exemptions shall be identified in a register. The Secretariat shall establish and maintain the register and make it available to the public.
4. The register shall include:
 - (a) A list of the Parties that have one or more exemptions;
 - (b) The exemption or exemptions registered for each Party;
and
 - (c) The expiration date of each exemption.
5. Unless a shorter period is indicated in the register by a Party, all exemptions pursuant to paragraph 1 shall expire five years after the relevant phase-out date listed in Annex A or B.
6. The Conference of the Parties may, at the request of a Party, decide to extend an exemption for five years unless the Party requests a shorter period. In making its decision, the Conference of the Parties shall take due account of:
 - (a) A report from the Party justifying the need to extend the exemption and outlining activities undertaken and planned to eliminate the need for the exemption as soon as feasible;
 - (b) Available information, including in respect of the availability of alternative products and processes that are free of mercury or that involve the

consumption of less mercury than the exempt use;
and

- (c) Activities planned or under way to provide environmentally sound storage of mercury and disposal of mercury wastes.

An exemption may only be extended once per product per phase-out date.

7. A Party may at any time withdraw an exemption upon written notification to the Secretariat. The withdrawal of an exemption shall take effect on the date specified in the notification.
8. Notwithstanding paragraph 1, no State or regional economic integration organization may register for an exemption after five years after the phase-out date for the relevant product or process listed in Annex A or B, unless one or more Parties remain registered for an exemption for that product or process, having received an extension pursuant to paragraph 6. In that case, a State or regional economic integration organization may, at the times set out in paragraphs 1 (a) and (b), register for an exemption for that product or process, which shall expire ten years after the relevant phase-out date.
9. No Party may have an exemption in effect at any time after 10 years after the phase-out date for a product or process listed in Annex A or B.

Lampiran 2

Japan and the Mercury-Poisoned Sea: A Reckoning That Won't Go Away

By : David E. Sanger

News 1

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MINAMATA, Japan— It is more than 35 years now since the cats in this fishing village along Japan's rugged southern coast began to foam at the mouth, tear at themselves and, in fits of crazed blindness, throw themselves into the sea. Next came the townspeople. Older residents of Minamata still tell vivid stories of watching their parents and children die excruciating deaths from mercury poisoning.

For years now Japan has tried to sweep beyond the horrors that made the name Minamata synonymous with industrial disasters. In the official histories of Japan's industrial resurgence after World War II, the story of how the Chisso Corporation dumped tons of mercury into one of Japan's richest fishing grounds was long ago relegated to brief mention. The question of why it took nearly a decade and 1,000 deaths before the Government took significant action is almost never discussed.

But in the last few months, the negligence, the bitterness and the country's longstanding unwillingness to come to terms with the surviving victims of Minamata disease have unexpectedly blown back with a fury on a stunned Government here. Surprising Judicial Decisions more than a half-dozen separate courts have issued a surprising series of decisions virtually ordering Government officials to recognize 2,000 more people who say they are victims of Minamata disease, and to negotiate compensation for them quickly, before they die.

In a highly unusual standoff, the Government of Prime Minister Toshiki Kaifu has refused to comply, in part, it seems, because negotiation itself would be tantamount to an admission that Tokyo bore significant responsibility for not acting more swiftly to prevent the gruesome deaths. And the settlements would just be a start: an additional 8,000 people who have not taken court action say that they, too, have suffered brain damage, paralysis or loss of hearing or sight stemming from the Minamata case.

In a country where the veneer of Government-ordered harmony rarely cracks, at least in public, Minamata has created a significant exception. A renegade Governor here on Kyushu, Japan's southernmost island, has openly broken with the governing Liberal Democratic Party and done what Japan said it would not:

negotiate with thousands of people who say they, too, are victims of Minamata disease.

Then, in mid-December, a ranking official of the Environment Ministry directing the case committed suicide. His death is shrouded in mystery, with some colleagues saying he was overworked, but there is evidence that he was also distraught over the decision of the Environment Minister, who has since been dismissed in a Cabinet shuffle, to go to Minamata and talk directly with the victims.

To many, Minamata has become a case study in Japanese power politics, in the conflicts between Tokyo and distant Japanese towns and in the nature of the symbiotic relationship between the Japanese Government and industry.

"We talk a lot about how immature the Japanese political system is, how the national Government tries to control everything, including the courthouse," said the Governor, Morihiro Hosokawa, who as the direct descendant of the feudal lords who once ruled the region holds great sway here in his battles with Tokyo. "But there are few cases that show so clearly how perverse the Japanese system has become. So I decided to tell the Prime Minister that before you look up at the world's environmental problems, look down at your toes, where the problem is." Fishing Grounds Still Polluted

Indeed, the environmental disaster that struck Minamata has never really stopped. Though much of the mercury has been dredged from the bay overlooking the Shiranui Sea, the fishing grounds are still dangerously polluted and the fishermen, who numbered heavily among the victims, are gone.

Minamata's population has declined by a third, to fewer than 35,000, and most of those who are left are elderly. Young people who flee for the cities after graduating from high school say they go to great lengths to conceal their origins because elsewhere in Japan Minamata's residents are often regarded as "polluted," even if they do not suffer from Minamata disease.

"You simply cannot get a position in a company if people know you are from Minamata," said Tsuginori Hamamoto, a leader of one of the many victims' groups, who is himself confined to a wheelchair because of mercury-tainted fish he ate. "For young people, it is almost impossible to find a marriage partner." Bitter Divisions

Moreover, the town itself is bitterly divided. Mr. Hamamoto and other victims are constantly pressing for memorials and commemorative museums that they say would restore some dignity to the victims; many other residents want all reminders of the disease swept away in hopes that Chisso, whose factory still dominates the town, will invest further here.

Years of protests and sometimes even violence have splintered the victims themselves, some supporting Japan's Communist Party, which has provided them with legal aid that they could not get from the Government, and others arguing that the Communists have cynically used the victims to advance their own candidates.

Minamata's Government talks of turning the bay, now being filled in to cover the polluted seabeds, into an environmental park that will draw conferences and tourists. To outsiders, that plan seems almost like a cruel joke in a town that most Japanese go out of their way to avoid.

For Tokyo, however, the vexing issue is not tourists but the victims and alleged victims, who after a generation still refuse to drop their claims.

Their case hinges on the slowness with which both Chisso and the Government reacted to the mounting evidence that mercury poisoning was setting off the convulsions, severe birth defects, paralysis and loss of speech and hearing that rippled through the town.

Though fish that swam close to the plant were seen for years floating belly up, Chisso was not formally identified as the source of the poisonings until 1959, in part because the company, citing trade secrets, refused to cooperate with health investigators. A commission to study the causes was dismissed when it reached an unpopular if obvious set of conclusions.

"The social situation in the town was such that the company could not be told to stop emitting waste water," said Masazumi Harada, a medical professor at Kumamoto University who has devoted much of his career to studying the case. "And people in Tokyo did not even know where Minamata was." Families refused to report that their relatives were dying from mercury poisoning, for fear it would lead to ostracism and be a cause of shame for generations.

The Government did little, refusing even to ban fishing in the bay until 1968, after another outbreak of the disease closer to Tokyo forced action.

Today Chisso's giant plant, which dates from the turn of the century, still dominates the town. It has shrunk to a fraction of its size at the time of the disaster, employing only 900 people, who now make much of the world's supply of liquid crystal, the organic material used to form numbers and letters on the flat-panel screens of calculators and laptop computers.

But the company is barely profitable, in large part because of a settlement it reached with several hundred victims and survivors in 1973. That settlement covered the most obvious victims, people like Mr. Hamamoto, whose muscles still visibly tremble, and it nearly bankrupted the company.

Now both the local and national governments, and Chisso itself, are facing court decisions that raise the specter of thousands of more compensation cases. Chisso says it simply cannot afford to pay. "We cannot survive without the Government's help," said Norio Ishida, the manager of Chisso's legal affairs department. 'A Rare Act'

The courts have effectively dismissed the narrow definition of Minamata victims long used by the Government, a definition that embraced only 2,900 people, a third of whom have died. That was a rare act for the Japanese judiciary. "I think everyone in the Government assumed they would win, as they usually do," said Governor Hosokawa. "They were shocked when suddenly the courts said otherwise."

Takenori Goto, a Tokyo lawyer who has spent most of his career working for the mercury poisoning victims, said, "The national Government's policy is that if the case drags on long enough the plaintiffs will die."

It is difficult to tell what maladies are caused by mercury poisoning. "These are people who are completely different from the first patients, and the problem is whether they are truly victims of Minamata disease or not," said Akimori Ogawa, an official of the Environmental Protection Agency.

He is speaking of people like Masato Ogata, a fisherman who was six years old at the height of the poisonings, which killed his father in 1959, only two months after he first developed symptoms. The next year Government doctors tested Mr. Ogata, and their records, which were kept from the victims for more than 25 years, show they found 182 parts per million of mercury in his hair, a dangerously high level.

"My limbs and head still feel very numb," he said, "and parts of my body still suffer from spasms and cramps." But his symptoms are nearly impossible to trace directly to mercury poisoning. Mr. Ogata says he has given up fighting for recognition as a Minamata victim, out of frustration.

In recent weeks the Government has shown a few signs of giving in. It is talking about some additional medical care for those who claim they are victims, though the amounts would be small.

And in Minamata, many people just want the memory to go away, for fear that Chisso, still the town's biggest hope, will be driven into bankruptcy. It is a form of dependency that Professor Harada says has deep roots in Japan. "In the Edo period, farmers had to offer much rice to the feudal lord," he said, referring to the era that ended in 1868. "But not many peasants complained, because they thought they could not live without the lord. The same is still true."

Japan's Minamata Disease Still Lingers

By : Joseph Coleman

News 2

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Sumber:

www.foxnews.com/printer_friendly_wires/2007Sep29/0,4675,JapanPoisonousLegacy,00.html

SHIRANUI SEA, Japan — The dawn is still only a faint glow beyond distant mountains, but fisherman Akinori Mori and his wife, Itsuko, are already hard at work on their boat, reeling in nets of squid, fish and crabs.

Nothing about this placid scene reveals that Japan's worst environmental disaster unfolded here.

Starting 50 years ago, whole neighborhoods were poisoned by mercury-contaminated fish from these waters. Thousands of people were crippled, and hundreds died agonizing deaths. Babies were born with horrifying deformities.

Today, the tragedy known as Minamata Disease is only a dim memory to the rest of the world, and few outside Japan would recognize Chisso Corp. as the company that polluted Minamata Bay and the Shiranui Sea with deadly methylmercury. But for Akinori, 62, and Itsuko, 58, and many of the people living along these craggy coasts, the disaster never ended.

The Moris' parents — his father, both her parents — suffered the ravages of the disease: blinding headaches, crippling loss of sensation in their limbs, insomnia and dizzy spells. Both Akinori and Itsuko increasingly feel the disease in their own bones as they age, in painful hand and leg aches and loss of feeling and coordination from eating tainted fish as children.

"Now it's starting in my hands and fingers," said Itsuko as she picked strips of seaweed from her fishing nets in the morning sun. "They're turning white and are all bent."

Like the Moris, Japan has never fully recovered. Indeed, the disease played a large role in creating the Japan of today. It gave birth to the Japanese environmentalist movement, and like the Chernobyl nuclear meltdown and the Union Carbide chemical disaster in Bhopal, India, it became an international cause celebre.

It forced the country to face up to the price of the industrial miracle it built out of the wreckage of World War II, encouraged other victims of such negligence to sue for redress, and forced authorities to be much more attentive to protecting the public from the mistakes of Japan Inc.

But the struggle over Minamata is far from finished. At least 2,000 victims have died. Even now, courts are forcing the government to recognize more victims, which some estimate at as many as 30,000. Many are confined to wheelchairs or bed, complaining that diagnosis and treatment are haphazard and inadequate. Lawsuits for further compensation continue. The government still refuses to conduct an epidemiological study to determine the full scope of the poisoning. "Minamata Disease has been going on for 50 years, but it still hasn't been resolved," said Takeko Kato, managing director of Hotto Hausu, a vocational aid center for victims in Minamata. "The country isn't helping these people enough."

The disaster in Minamata Bay began in silence.

In the early 1950s, growing numbers of fish were found floating dead in the bay, which feeds into the Shiranui Sea. Then crows fell dead from the sky or crashed into rocks. Cats started gyrating in a bizarre "dance" before dropping dead.

People were next. By the mid-1950s, villagers started suffering dizzy spells and troubles walking and speaking. Growing numbers fell into convulsions, wasted away and died. The name Minamata Disease was coined in 1956.

From the beginning, it was a malady no one wanted to talk about.

Victims, shunned by neighbors who feared the illness was contagious, hid behind closed doors. Fishermen suffered symptoms in silence, terrified that word of the disease would wreck their livelihood. Often it was the people most in danger who fought doctors trying to help them.

"They always said there's no Minamata Disease around here," said Shigeo Ekino, a scientist at Kumamoto University who has been researching victims since 1971. "Because if the journalists wrote the disease was here, the price of the fish would drop."

Economics also insulated the culprit from blame for the methylmercury it dumped during the production of the chemical acetaldehyde, used to manufacture various products including pharmaceuticals.

In the 1950s, Chisso was a shining triumph in Japan's feverish push for postwar economic development, and it held both bureaucrats and Minamata locals in awe

_ an untouchability that allowed it to refuse for more than a decade to accept responsibility.

The government, bent on industrial growth at any cost, did what it could to keep news of the disease quiet. Hoping to hide the source of the poisoning, Chisso rerouted its wastewater, thereby polluting a much larger area. The company continued to dump mercury in the waters with impunity until 1968.

"The whole country was so caught up in high growth ... that it was easy to overlook things," said Timothy George, a historian at the University of Rhode Island and author of "Minamata: Pollution and the Struggle for Democracy in Postwar Japan."

Chisso first offered "sympathy money" to small numbers of victims and fishing cooperatives in 1959, though it denied culpability. After the government declared it at fault, the company had to pay much larger compensation packages in the 1970s. Additional victims received money in the 1990s.

Still, critics say the collusion between government and industry continues to protect the company from the full cost of its crimes. The government, for instance, has adhered to strict criteria that severely limited the number of "certified" victims eligible for the largest of the compensation packages _ only 2,960, including nearly 700 from a separate mercury poisoning case involving a different company in northern Japan. Of those, 2,078 have died.

The legal battle continues. In a landmark decision, the Supreme Court ruled in 2004 that the government was responsible for the spread of the disease. Since then, an additional 12,000 people have become eligible for medical assistance, though not full certification, and the government is working on a plan to expand compensation to more than 5,000 additional people demanding recognition.

"You've had this strange resurgence in recent years. Suddenly, you've had lots more people who wanted compensation for Minamata Disease," said George.

One reason is that Japan is aging and more attention is paid to the welfare of the elderly. Another is that formerly taboo subjects are confronted more directly in media and society, and victims care less about what the neighbors will say.

As the country has become richer, the focus has shifted from all-out industrialization to improving quality of life. As Japanese democracy has

broadened and become more inclusive, courts have become more accepting of claims against big business. Full disclosure, however, is still far away.

The government, for instance, refuses to seek out remaining reluctant _ or unwitting _ victims with a full scientific study of the affected area, saying it's up to those with symptoms to take the initiative.

At the government-run National Institute for Minamata Disease, officials show visitors a video that, while detailing the horrors of the disease, sunnily concludes that the resulting issues have been solved.

Katsuhiro Nagai, a spokesman for the institute, said there was no reason to conduct a full survey.

"If people think they have the disease, then they can try to get compensation," he said. "That's our system for all diseases."

Victims also say the diagnosis and compensation system is haphazard and confusing. Indeed, the big settlements over the years have created a bewildering, arbitrary patchwork of payments and entitlements.

And nobody knows what danger still lurks at the bottom of the sea.

As part of the cleanup, Chisso and the government covered the worst-contaminated areas with landfill, dredged mercury from the water and capped mercury-soaked portions of the seabed with a steel and cement barrier. The government declared the area safe for fishing in 1997.

But some fish have been found with high concentrations of methylmercury, and unusually high rates of contamination are still found in sediment in Minamata Bay, though officials say they are within safety standards.

Environmental authorities say inspections of the barrier are carried out every year, with detailed studies every five years. But Yoshiaki Yasuda, a scientist at the Minamata institute, says researchers there were refused permission some years ago to do their own investigation.

"I guess this is quite a delicate issue that we are not allowed to delve into," Yasuda said.

One place where no one is silent about Minamata Disease is at the Hotto Hausu vocational center.

In a tiny building in downtown Minamata, 13 disabled people _ including nine who were poisoned by mercury in the womb _ arrived for lunch one day after making a presentation about the disease at a local school.

Victims in wheelchairs struggled with gnarled hands and fingers to eat lunch, some of them fed by assistants. Neurological damage had left them with severe speech impediments.

Age is compounding their problems. As the congenital victims move into their 50s and 60s, their bodies deteriorate more rapidly than those of healthy people.

Masafumi Takishita, 51, was married for a while, has a 13-year-old son and works at a bottle recycling plant that employs the disabled.

But his legs have rapidly lost strength in recent years, and now he walks on a cane or a friend's arm. He takes nine varieties of drugs, from muscle relaxants to antidepressants.

Critics say cases like Takishita's show how the government needs to expand rehabilitation services and specialized care for thousands of aging victims.

Meanwhile, the Moris have fixed their hopes on their three children, all of whom have married and show no symptoms of poisoning. They can only hope that the new generation will see the end of the curse of Minamata.

"They're OK, I think. The poisoning was years before they were born," said Itsuko Mori as she picked through her nets on a dock not far from her home. "They're still young though, so you never know."- Associated Press Writer Kana Inagaki in Tokyo contributed to this report.

Japan upholds Minamata ruling

By Bethan Jinkinson

News 3

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The supreme court in Tokyo has held the Japanese government partly responsible for a mercury poisoning case which killed hundreds of people in the 1950s and 60s.

The court upheld a ruling in 2001 that the government - as well as the chemical manufacturer Chisso corporation - was responsible for the poisoning, known as Minamata disease.

Minamata is a small non-descript town on the Japanese island of Kyushu, whose name is now forever linked with mercury poisoning.

In the 1950s, local residents began complaining of numbness, slurred speech and strange behaviour.

Birds were seen literally dropping out of the sky and cats appeared to be behaving strangely.

By the late 1950s, the cause was apparent.

A local chemical manufacturer, Chisso, had been dumping mercury into Minamata bay.

This poisoned the fish, and then everyone and everything that ate the fish. By this point people were dying, and severe physical and mental side effects were being reported.

Nevertheless, Chisso continued to pump mercury into the sea until 1968.

Compensation

Court cases against Chisso and the Japanese government followed, and some victims received compensation.

In 2001, the Osaka high court held the Japanese government and Chisso jointly responsible. Chisso accepted the ruling, but the Japanese government appealed.

The final ruling by the supreme court should end all litigation relating to the case. But for the people still living with the side effects, the legacy of Minamata disease will continue for many years.

Mercury poisoning of thousands confirmed

Thirty years on, the victims of Japan's worst case of industrial pollution are getting support from scientists and the courts - but not the state

By : Jonathan Watts

News 4

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For Yasuko Tanaka, it started when the village cats turned into demons. One year, they were sleepy pets; the next, they were hyperactive monsters - screeching, scratching and jumping around as if possessed.

That was when she drew the connection between Japan's worst case of industrial pollution in nearby Minamata and the splitting headaches, tunnel vision and shaking hands that she and several other villagers had been suffering.

Yesterday, more than 30 years later, researchers presented evidence that the mercury poisoning of Minamata bay in the 50s and 60s lasted longer, spread further and affected tens of thousands more people than previously believed.

The study by doctors at Kumamoto University could cost the Japanese government billions of yen (millions of pounds) as thousands of claimants seek recognition as having Minamata Disease - the nerve disorder caused by eating seafood from the polluted bay or nearby waters. Symptoms of spasms, blurred vision and hearing loss were first recognised in the 50s when the ailment was called "itaiitabyo" (ouch ouch disease), but it was not until 1968 that the government blamed the nearby Chisso chemical corporation for pumping mercury waste into the bay.

More than 900 victims died in agony. Many babies in the area were born with knarled limbs. Thousands of victims were ostracised, first out of a mistaken fear that the disease might be contagious, and later, because their legal suits drew unwanted attention to the invisible pollution in this picturesque region.

In 1996, the government offered sufferers a modest settlement of about £1,500 in damages from Chisso and £120 a month in medical expenses from public funds. But since then it has only certified 2,264 victims, 1,435 of whom are already dead. Another 17,128 have applied for recognition.

According to the Kumamoto University research team, which is presenting its findings at a conference on mercury poisoning that started in Minamata yesterday, at least another 20,000 people are likely to be eligible.

By comparing levels of mercury and sensory disruption in residents on the far coast from Minamata with a control group from outside the area, the researchers

found that harmful levels of pollution spread beyond Minamata Bay and lasted until 1970, 10 years longer than government estimates.

They found that mercury damaged the central nervous system and impaired sight, hearing, smell, taste and touch when present at the level of just 10 parts per million in hair and umbilical cords. This is five times lower than the level recognised as harmful by the government. Campaigners for the rights of Minamata disease sufferers said the findings indicated that as many as 2m people might have eaten enough contaminated fish to suffer from such lesser, but still painful, side effects of mercury poisoning as constant headaches, loss of hearing and an inability to distinguish hot from cold.

The government, which has been accused of colluding with Chisso Corporation to cover up the environmental disaster, has never attempted to find out how many people were affected by Minamata disease. Instead, it has asked victims to come forward, which many are reluctant to do because they fear discrimination.

"The problem is that the government has not launched a detailed epidemiological study," said Shigeo Ekino, the professor who led the research. "They are afraid of looking into the wider area."

In May, after Professor Ekino presented his initial findings, the Osaka high court ordered the government to recognise the claims of victims who had been refused certification. The government has appealed.

Environment agency officials were unavailable for comment.