

## HPV Prevention Board and Control

Technical meeting: “Impact of COVID-19 on Cervical Cancer  
Screening, Treatment and Vaccination”

# Current situation of HPV vaccination programs across different regions in the world-Japan

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# The Covid-19 Pandemic in Japan (Overview)

## COVID-19 cases in Japan

As of 23:59 11/11 (JST)

	Confirmed	Severe	Died	Discharged
Total	112,880 (+1,546)	204 In ICU	1,876 (+12)	99,767
Domestic*	112,168	204	1,863	99,108
Diamond Princess	712	0	13	659

\* Including reinfections and evacuees from the Chinese province of Hubei government-chartered planes.

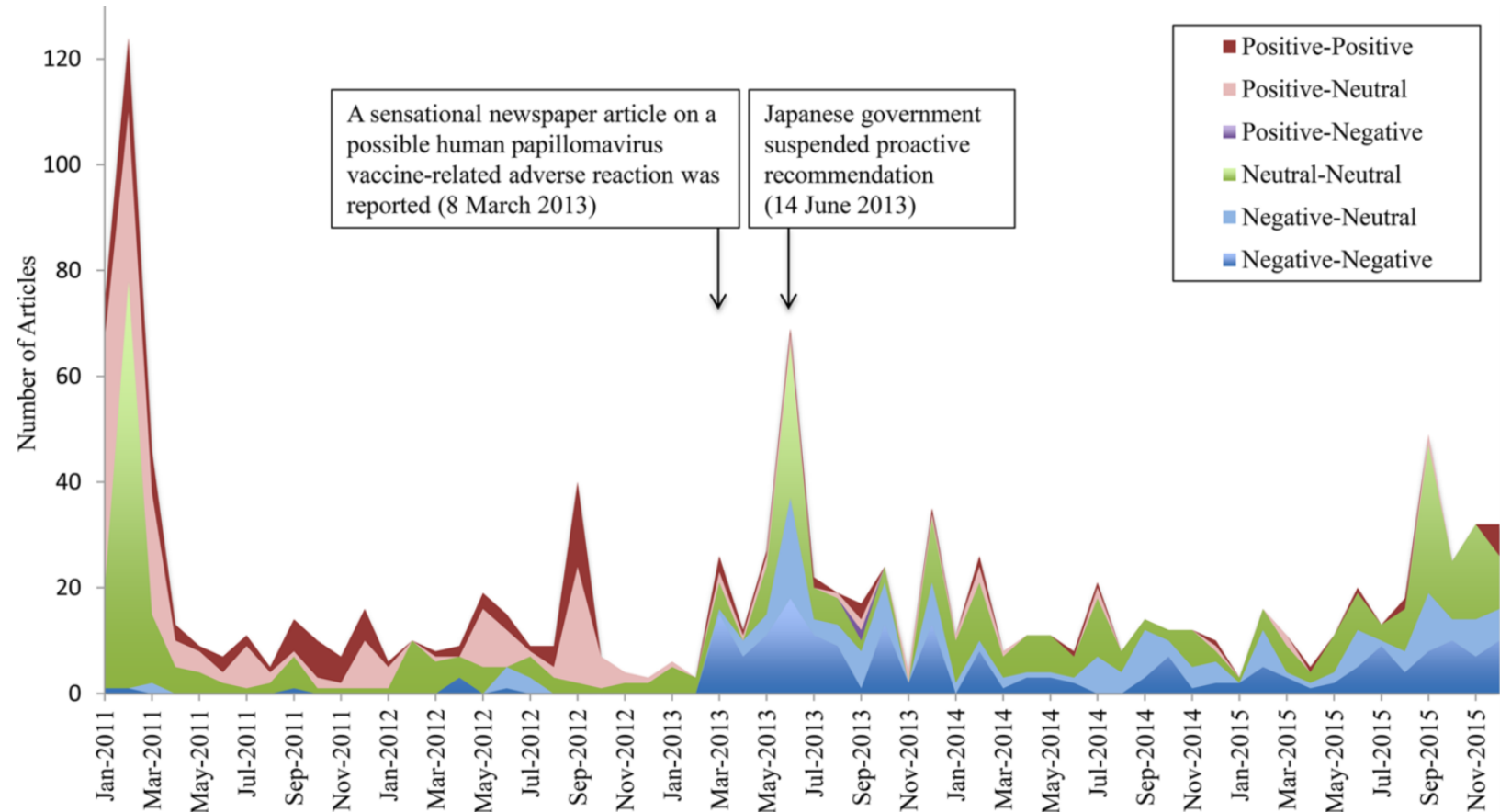
# Situation of HPV Vaccination in Japan- 1

## ❑ Temporary funding (Dec 2010)

- Girl aged 12-16yrs
- Community-based
- **80%** 1<sup>st</sup> dose coverage
- Both vaccines used
- Not school-based

## ❑ National Programme (Apr 2013)

- Girls aged 12-16yrs
- **Feb-March** Victims support group set up
- Unconfirmed reports of adverse events reported in media (**media storm**)



# Situation of HPV Vaccination in Japan- 2

## ❑ Proactive recommendations suspended (June 2013)

- Uptake drops from 80% to **<1%**
- International and domestic studies find **no relationship** between HPV vaccine and reported adverse events



No association between HPV vaccine and reported post-vaccination symptoms in Japanese young women: Results of the Nagoya study

Sadao Suzuki R, Akihiro Hosono

ⓑ Show more

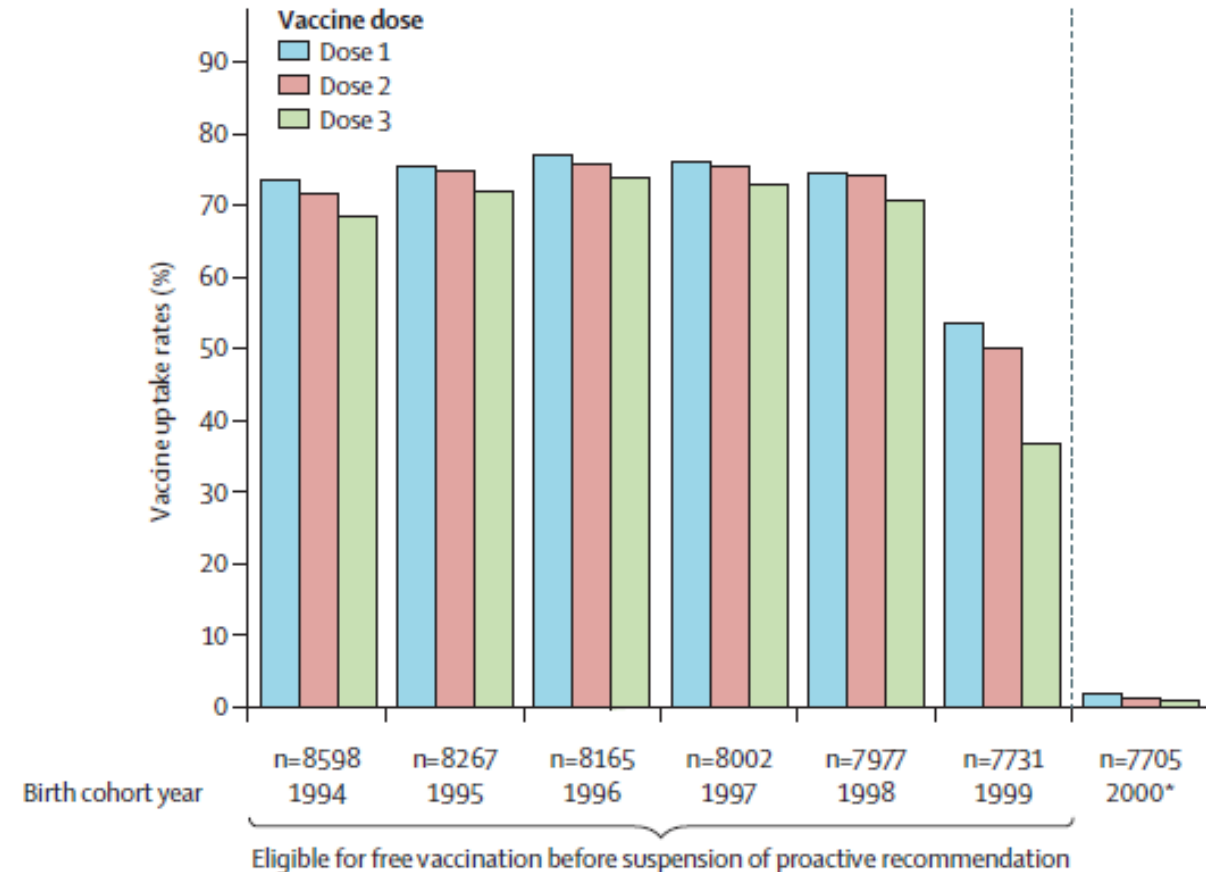
<https://doi.org/10.1016/j.pvr.2018.02.002>

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- Two dose schedule not approved
- Gender-neutral programme not considered
- Suspension continues to date

HPV vaccine uptake rates in Sapporo, Japan (at March 2014)





# Recent Developments with HPV Vaccination in Japan 1

## ❑ HPV 9 licensed in July 2020

- Data submitted in 2015
- Now being considered for the National Immunization Programme

## ❑ Cabinet reshuffle

- Health Minister responsible for suspending proactive recommendations reinstated...
- Deputy Health Minister- Cervical Cancer survivor and **vocal supporter** of the HPV vaccine

### HPV Vaccine Advocate Junko Mihara Picked as Vice MHLW Chief

September 23, 2020



The ruling Liberal Democratic Party's (LDP) Junko Mihara, a cervical cancer survivor and an advocate of HPV vaccines, was appointed senior vice health minister on September 18 together with Komeito lawmaker Hiroshi Yamamoto. The appointment was approved by the Cabinet,...



# Recent Developments with HPV Vaccination in Japan 2

□ September 2020

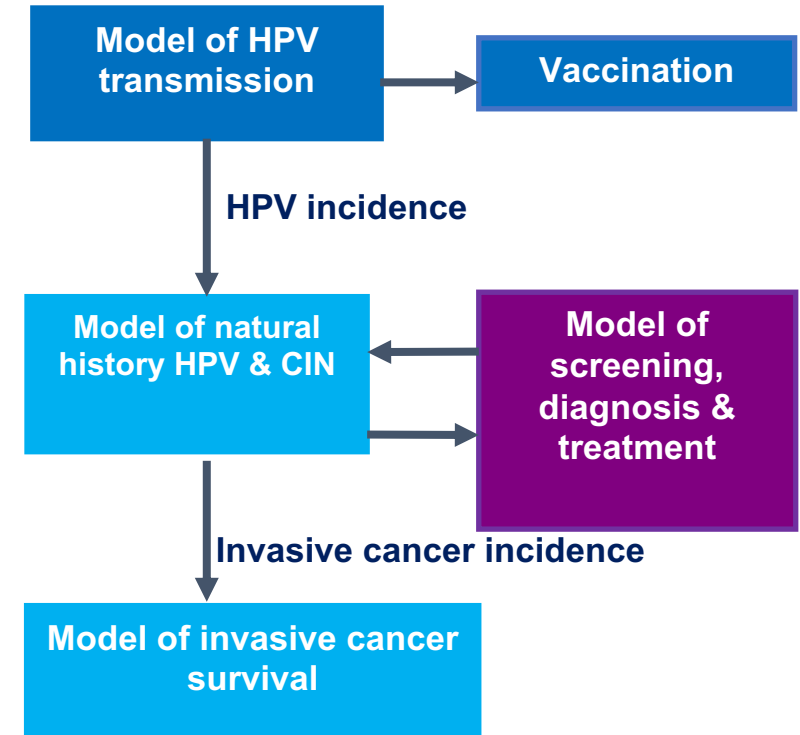
Ministry of Health, Labour and Welfare sends revised HPV vaccine information leaflets to local governments and recommends they send them out to the relevant people (girls, parents/guardian, health-care professionals)



# The Cost of Inaction

# Policy1-Cervix model

- A dynamic model of sexual behaviour, HPV transmission, vaccination, HPV type-specific natural history, precancer and cancer diagnosis/treatment<sup>1-25</sup>
- Explicitly models detailed screening management pathways, including test and diagnostic accuracy, imperfect precancer treatment, and imperfect adherence to screening (based on setting-specific data)
- Calibrated and validated across a range of settings, including Australia, NZ, England, rural/urban China, rural/urban Vietnam and rural India, and has been used to directly inform policy in some of these settings.



1. Canfell *et al*, Br J Cancer 2004
2. Barnabas *et al*, PLoS Med 2006
3. Smith *et al*, Int J Cancer 2008
4. Creighton *et al*, BMC PH 2010
5. Kitchener *et al*, HTA 2011
6. Shi *et al*, BMC Cancer 2011
7. Canfell *et al*, Vaccine 2011
8. Smith *et al*, Vaccine 2011

9. Walker *et al*, Stat Med 2012
10. Legood *et al*, BMJ, 2012
11. Lew *et al*, BMC HSR, 2012
12. Smith and Canfell, BMC RN 2014
13. Kitchener *et al*, HTA UK 2014
14. Smith and Canfell, PLoS One 2014
15. Smith *et al*, MJA 2016
16. Smith *et al*, BMC HSR 2016

17. Lew *et al*, PLoS One 2016
18. Simms *et al*, Int J Cancer 2016
19. Simms *et al*, Lancet PH 2016
20. Simms *et al*, PLoS One 2017
21. Lew/Simms *et al*, Lancet PH 2017
22. Velentzis *et al*, Int J Cancer 2017
23. Hall *et al*, PLoS One 2018
24. Hall *et al*, Lancet PH 2018

25. Smith *et al*, Vaccine 2018

# Scenarios Modelled

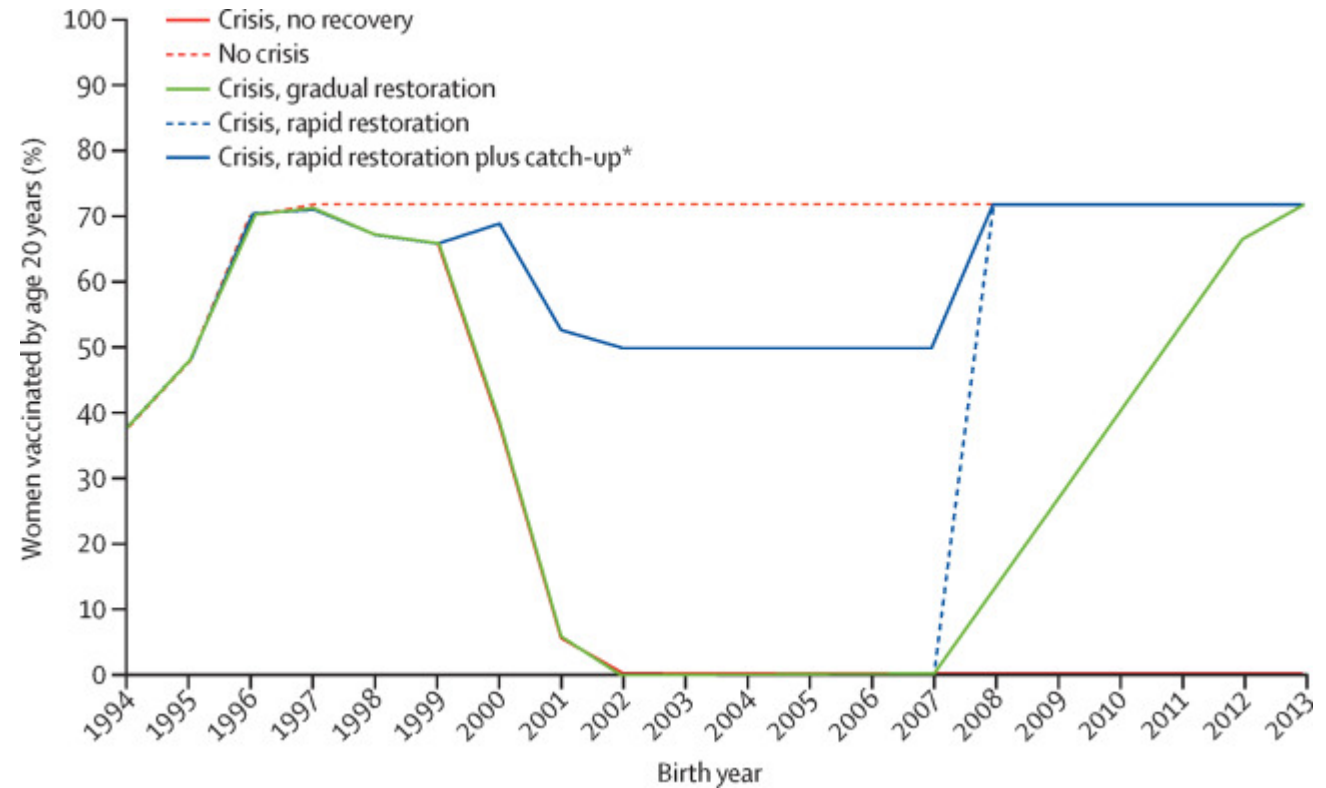


Figure 2 Vaccine coverage at age 20 years by birth cohort in five scenarios

# Results

## **Compared to if results had remained at 70%**

Among females born between 1994-2007

- **25,000** preventable cervical cancer cases
- **>5,000** additional deaths

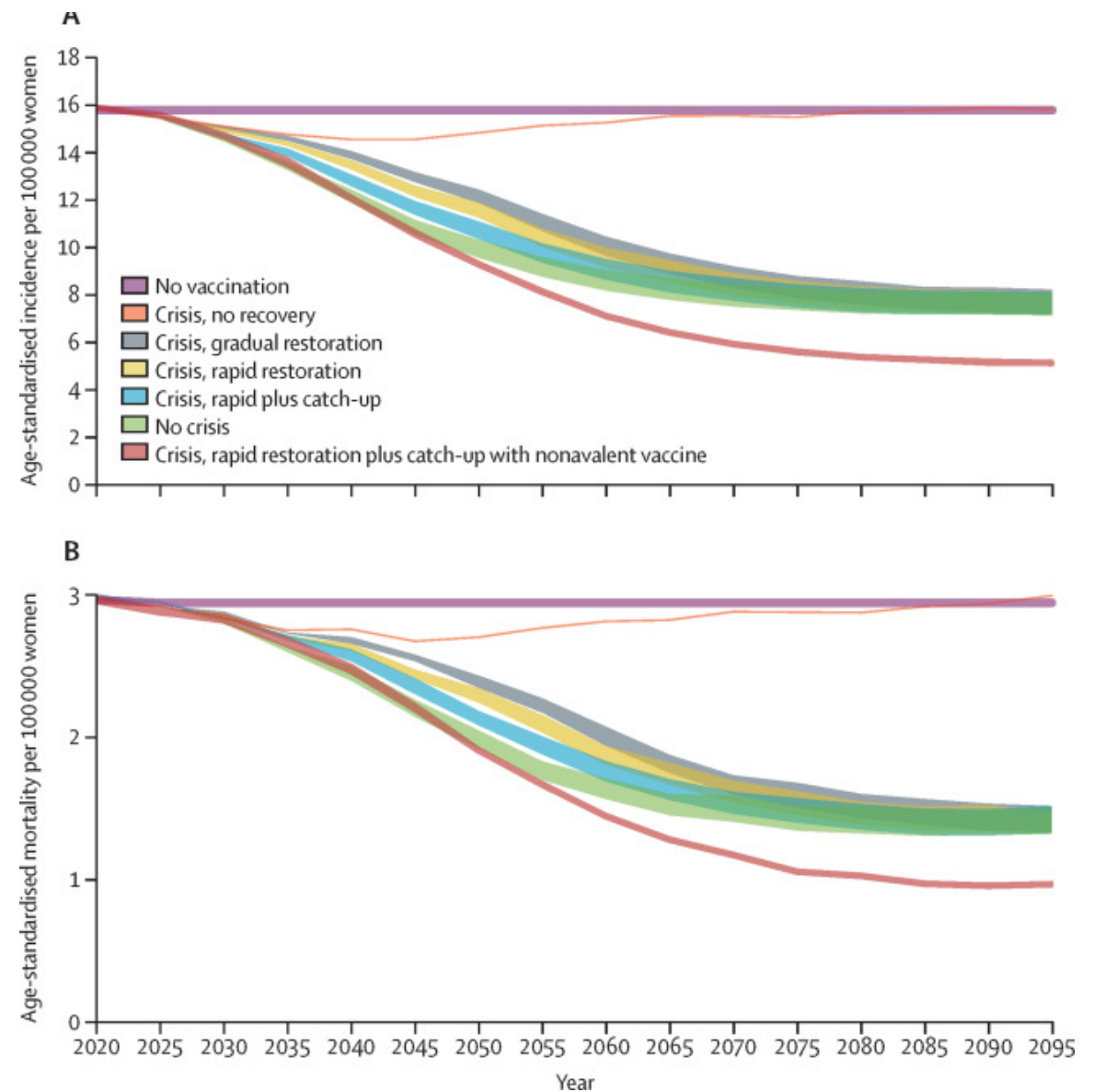
## **If coverage of <1% were to continue**

- **60,000** preventable cases
- **10,000** preventable deaths could occur in Japan over the next 50 years

## **If 70% coverage could be restored in 12yr olds in 2020 with 50% catch-up in girls 13-20yrs with HPV 9**

- **70-80%** of cases and deaths could be prevented

# Towards Cervical Cancer Elimination: Japan



Impact of the vaccine crisis and potential recovery scenarios from 2020 to 2095 on age-standardised cervical cancer incidence (A) and cervical cancer mortality (B)

- **No scenario** leads to the elimination threshold of  $<4$  cases / 100,000
- Increase in screening coverage also needed



# Summary

- Uptake of the HPV vaccine in Japan was originally high
- After suspension of proactive recommendations in 2013,
  - Uptake plummeted to <1%
  - COVID pandemic has not adversely affected uptake...
  - No policy changes were revised regarding dosage or gender-neutral vaccination
  - Failure to act has led to thousands of preventable cases and deaths
  - Much of the damage could still be mitigated with high-level political support
  - Hopeful licensing of HPV9 and new Deputy Health Minister may signal change



Thank you