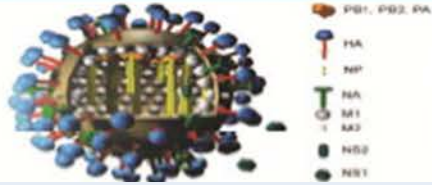
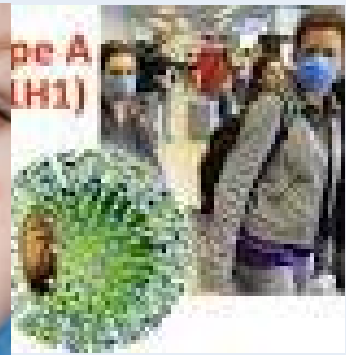
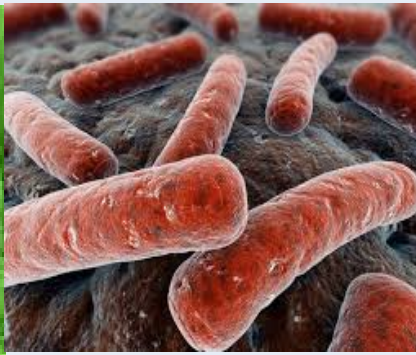
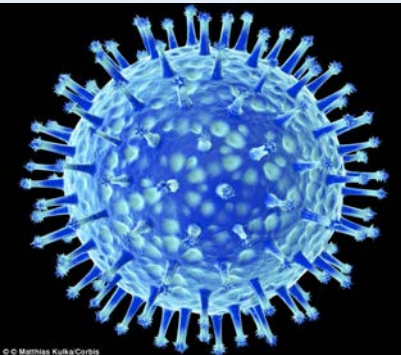


# Sự Khởi Đầu Mới Trong Kiểm Soát Nhiễm Khuẩn



## VAI TRÒ VỆ SINH TAY TRONG PHÒNG LÂY NHIỄM QUA ĐƯỜNG HÔ HẤP



# Tác nhân lây truyền qua giọt bắn

---

- Adenovirus, cúm mùa, SARS,
- Cúm gia cầm A (H5N1/H1N1/H7N9).
- Não mô cầu, Quai bị, Parvovirus, Rubella
- Haemophilus influenza type B
- Nhiễm Neisseria meningitidis
- Bạch hầu, Dịch hạch, Mycoplasma

# Tác nhân lây truyền qua đường không khí

- ▶ Một vài bệnh nguyên lây truyền qua những giọt phân tử nhỏ có khả năng lây nhiễm trong khoảng cách xa hơn 1 mét
- ▶ Lao phổi, sởi, và thủy đậu lây truyền qua đường không khí
- ▶ Khi một bệnh hô hấp mới đầu tiên xuất hiện (chưa được báo cáo trước đây), khả năng lây truyền qua đường không khí nên luôn được xem xét

# SARS

Sáng ngày 25/4, tại buổi mít tinh kỷ niệm 10 năm Việt Nam phòng chống dịch SARS thành công, bà Nguyễn Thị Kim Tiến, Bộ trưởng BYT bày tỏ sự tri ân sâu sắc với những bác sĩ đã hy sinh thân mình cho dịch bệnh lạ mới nổi đã nói:

*“Việt Nam là nước đầu tiên khống chế thành công dịch bệnh từng khiến cả thế giới khiếp sợ thời điểm đó, nhưng đổi lại, 5 nhân viên y tế cũng đã phải từ bỏ mạng sống vì lây nhiễm vi rút chết người này”.*

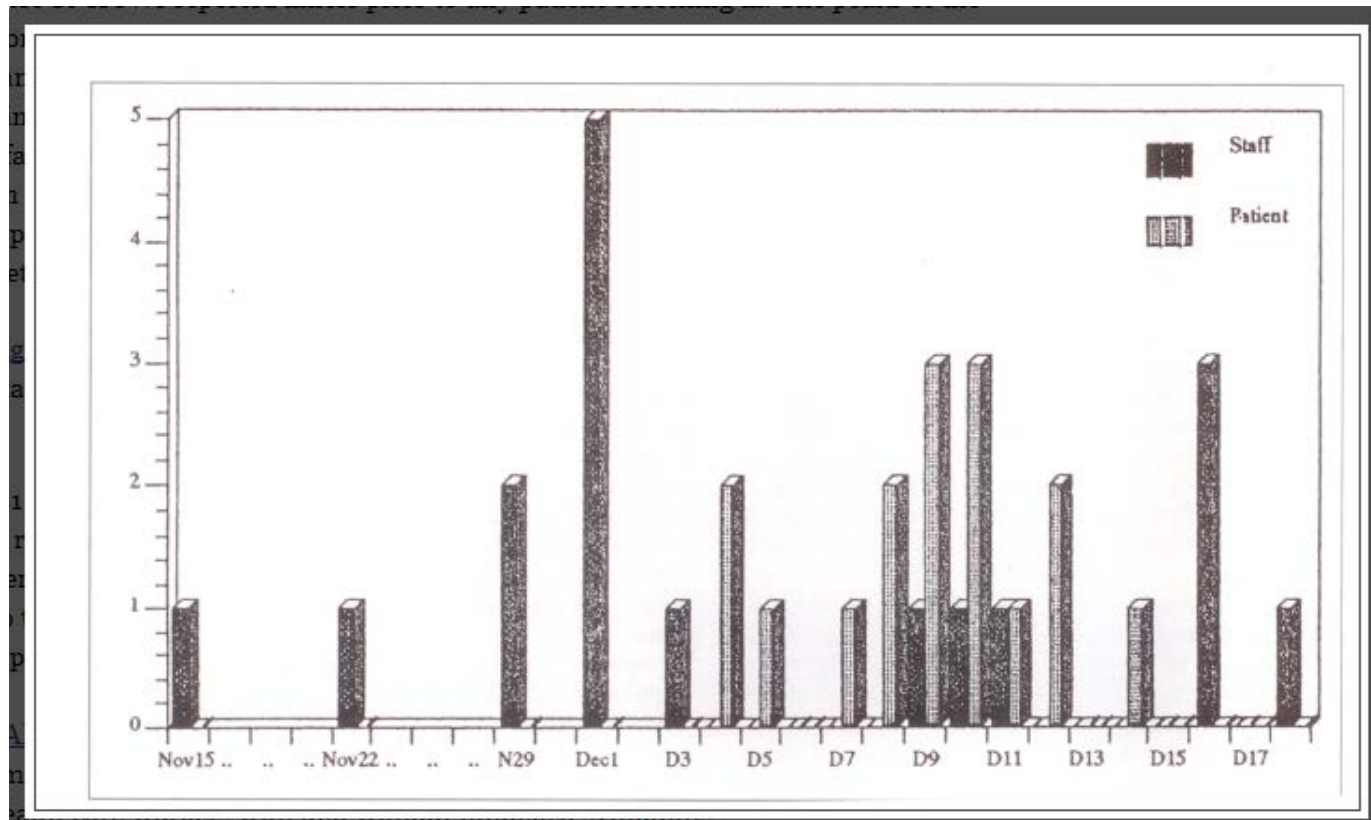
# LÂY NHIỄM TÁC NHÂN LÂY TRUYỀN ĐƯỜNG HÔ HẤP Ở NVYT ???

- 2005: Thông tin từ Bệnh viện Nhi đồng II (TP.HCM) chiếu qua 17.6 cho biết có 8 NVYT (đều là điều dưỡng) thuộc khoa Hồi sức của BV bị lây nhiễm bệnh thủy đậu từ một bệnh nhi đang điều trị tại đây. BV đã chi 12 triệu đồng để chủng ngừa phòng bệnh trái rạ cho toàn thể y bác sĩ, nhân viên của khoa Hồi sức.

*Thanh Tùng-Báo Sức khỏe và đời sống, 17 /6/2005*

- 2009: 15 NVYT tại BV Thống Nhất TP HCM, bị lây nhiễm Cúm A(H1N1). 1 BS tại BV Colombia bị lây nhiễm Cúm,.....

An influenza A outbreak involving 17 HCWs and 16 chronic geriatric patients on a ward in a tertiary care hospital was reviewed. 37% of all HCWs and 47% of patients on the affected wards became ill with influenza. 3 patients died during the outbreak. **The majority of health care workers became ill prior to detecting the first patient case of influenza, suggesting that nosocomial spread from HCWs to patients may have occurred.**

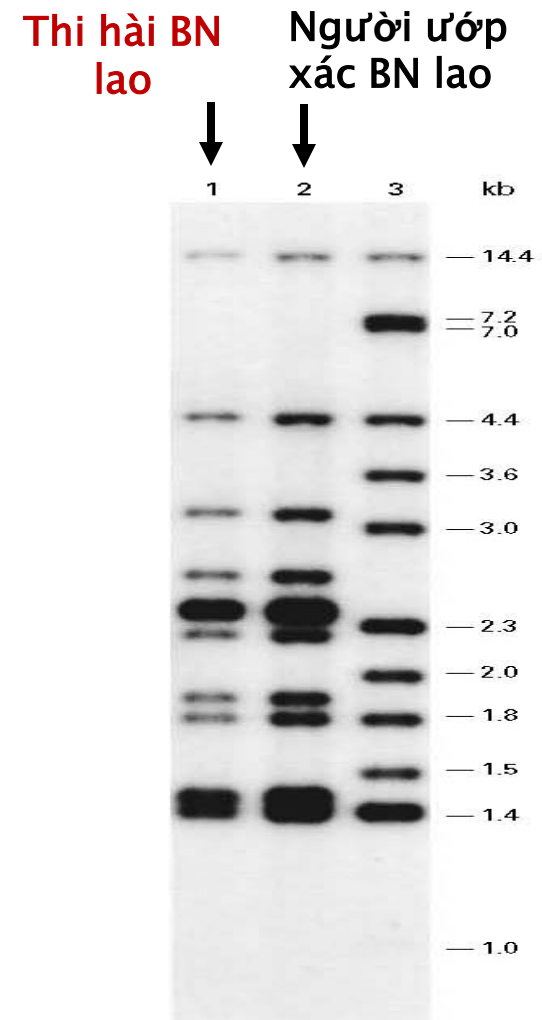


**Staff and patient morbidity by date of influenza A onset**

*[Annalee Yassi](#), [Myrna McGill](#), Morbidity, cost and role of health care worker transmission in an influenza outbreak in a tertiary care hospital, *Can J Infect Dis.* 1993 Jan-Feb; 4(1): 52–56.*

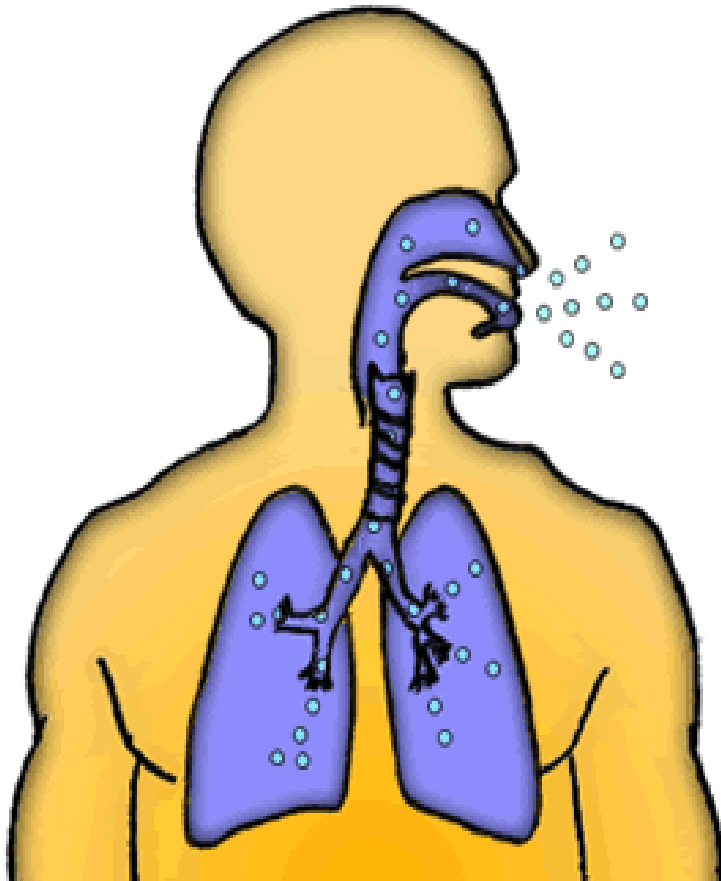
# Lan truyền bệnh lao từ BN tử vong

- Dịch tễ học
  - Khâm liệm—Người tham gia chôn cất bệnh nhân:
    - Mức độ phản ứng với tiêm tuberculin trong da tăng
    - Tỷ lệ mắc bệnh lao tăng
- Nghiên cứu tình huống
  - Lan truyền lao trong quá trình ướp xác được khẳng định do vi khuẩn lao ở người ướp xác và thi hài người bệnh có cùng kiểu gen.



*NEJM 2000; 342:246*

# ĐƯỜNG LÂY TRUYỀN CỦA MỘT SỐ VIRUS GÂY BỆNH NKHHC CÓ NGUY CƠ GÂY DỊCH (CÚM A\_H5N1/H1N1, SARS, LAO, SỞI,...)



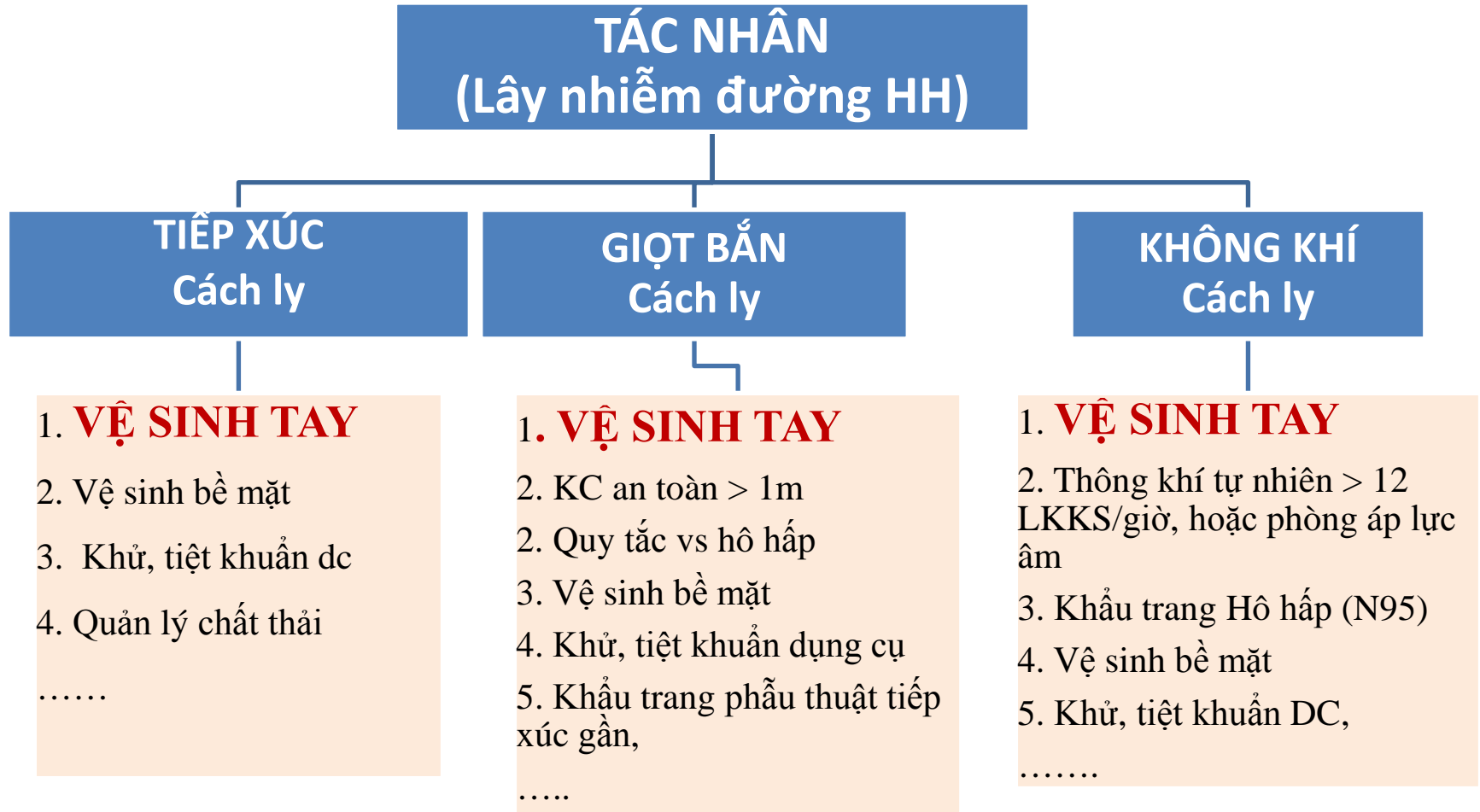
→ Qua giọt bắn

→ Qua tiếp xúc chất tiết

→ Qua không khí  
trong trường hợp có làm thủ  
thuật tạo giọt khí dung



# ĐƯỜNG LÂY VÀ PHÒNG NGỪA



# Effectiveness of hand hygiene and provision of information in preventing influenza cases requiring hospitalization

*Pere Godoy, Jesús Castilla, Miguel Delgado-Rodríguez et al*

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*P. Godoy et al. / Preventive Medicine 54 (2012) 434–439*

**Table 5**

Health information and non-pharmacological measures for the prevention of influenza requiring hospitalization (cases and community controls), Spain 2010.

Features	Cases n = 702 (%)	Outpatient controls n = 704 (%)	Crude OR (95% CI)	p-value	Adjusted OR (95% CI)	p-value
<b>Received information on prevention<sup>a</sup></b>	584 (93.9)	643 (92.9)	0.34 (0.23 - 0.51)	<0.001	0.44 (0.26-0.72)	0.001
<b>Frequency of daily hand washing<sup>b</sup></b>						
1-4 times	282 (41.2)	215 (30.7)	1		1	
5-10 times	247 (36.1)	257 (36.8)	0.71 (0.54-0.92)	0.01	0.72 (0.52 - 0.99)	0.04
> 10 times	155 (22.7)	227 (32.5)	0.45 (0.33 - 0.61)	<0.001	0.57 (0.39-0.82)	0.003
<b>Use of alcohol-based hand sanitizers<sup>c</sup></b>						
Never	475 (69.9)	449 (64.4)	1		1	
Sometimes	205 (30.1)	248 (35.6)	0.74 (0.57 - 0.95)	0,02	0.76 (0.57 - 1.02)	0.06
<b>Handwashing after touching contaminated surfaces<sup>d</sup></b>						
Never	166 (24.0)	108 (15.5)	1		1	
Occasionally/Always	526 (76.0)	588 (84.5)	0.51 (0.38 - 0.69)	<0.001	0.61 (0.42 - 0.88)	0.01

OR, odds ratio.

CI, Confidence interval.

<sup>a</sup> Adjusted OR for: Ethnicity, Educational level, Chronic cardiovascular disease, Diabetes, AIDS, Inhaled corticosteroids and non-pharmacological measures.

<sup>b</sup> Adjusted OR for: Educational level, Asthma, Diabetes, AIDS and non-pharmacological measures.

<sup>c</sup> Adjusted OR for: Educational level, COPD, Asthma, Previous antibiotics, Systemic corticosteroids and non-pharmacological measures.

<sup>d</sup> Adjusted OR for: Educational level, COPD, Chronic cardiovascular disease, AIDS, Transplantation, Previous antibiotics, Systemic corticosteroids, Inhaled corticosteroids and non-pharmacological measures.

# Sử dụng PTPHCN và lây nhiễm SARS

	Không NK n=331	Có NK n=127	P* < 0.05	OR
<b>Khẩu trang</b>	<b>94.4</b>	<b>85.8</b>	<b>0.0</b>	<b>26</b>
<b>Rửa tay</b>	<b>97.2</b>	<b>90.6</b>	0.004	3.9
<b>Găng</b>	<b>93.6</b>	<b>86.7</b>	0.026	2.3
<b>Áo choàng</b>	<b>99.9</b>	<b>88.6</b>	0.000	4.8
<b>Mũ</b>	<b>87.0</b>	<b>49.2</b>	0.000	6.5
<b>Kính</b>	<b>85.6</b>	<b>45.2</b>	0.000	7.1
<b>RT_G_A_K</b>	<b>81.2</b>	<b>40.5</b>	<b>0.000</b>	<b>6.4</b>



Hosts

Programme & Speakers

Travel Info

Sponsorship & Exhibition

Ve

# 6th International Congress of the Asia Pacific Society of Infection Control

Strategic Practices for Combating Microbial Resistance

10th-13th April, 2013

Shanghai International Convention Center

Shanghai, PR China



## Programme & Speakers

› Topic Highlights

› Speakers

› Agenda

› Pre-Workshop

› Social Networking

## TOPIC HIGHLIGHTS

- A. Infection Control and Accreditation
- B. New Bundles that actually works
- C. The updated WHO Acute Respiratory Disease Infection Control
- D. Environment Cleaning or Decontamination – A Systematic Review of Chemical Disinfectants and Environment Cleaning
- E. Prioritization of Isolation Measures
- F. New developments in using IT for surveillance
- G. New procedures for Infection Control in Renal Dialysis

Parameter	Number
Episodes of healthcare-associated infections	
Observed	15,301
Predicted <sup>a</sup>	16,805
Total reduction (%)	1,504 (8.9%)
Costs of the hand hygiene program in US dollars	
Total alcohol handrub expense	221,517 <sup>b</sup>
Campaign costs (posters, salaries, <sup>c</sup> etc.)	22,953
Total cost <sup>d</sup>	244,470
Average cost per 1000 patient-day	90.60
Average cost to prevent one episode of HAI	162.50
Extra costs per episode of HAI <sup>e</sup>	5,335 ± 13,872
Mean cost reduction for HAIs	8,023,840
Mean net cost savings from the hand hygiene program	7,779,370

Parameter	Value
Episodes of healthcare-associated infections <sup>b</sup>	
With hand hygiene program	14,608
Without hand hygiene program	16,032
Number of averted episodes of HAI	1,424
Saving from extra costs arose from episodes of HAI	5,522,408 <sup>c</sup>
Extra costs of the hand hygiene program	233,044
Extra cost to prevent one episode of HAI	163.6
Net benefit <sup>d</sup>	5,289,364
Benefit cost ratio <sup>e</sup>	23.7

<sup>a</sup>Predicted by Poisson regression model described in Methods and Text S1.

<sup>b</sup>All monetary values are expressed in US dollars. The average exchange rate 2007: 1 US dollar = 32.842 New Taiwan dollars, 1 Euro = 44.952 New Taiwan dollars.

<sup>c</sup>The salaries were limited to the proportion of working hours of infection control nurses spent for the hand hygiene audits, not include those of infection control nurses in planning and education and not include those of infectious disease specialists.

<sup>d</sup>Variable costs including soap, water and materials used for drying hands (e.g. towels) were not included.<sup>8</sup>

<sup>a</sup>All future costs, number of episodes of HAI, and benefits were discounted to the present value at an annual rate of 3%.

<sup>b</sup>Predicted by Poisson regression model described in Methods and Text S1.

<sup>c</sup>All monetary values are expressed in US dollars. The average exchange rate in 2007: 1 US dollar = 32.842 New Taiwan dollars, 1 Euro = 44.952 New Taiwan dollars.

<sup>d</sup>Net benefit = Benefit - Cost.

## Effectiveness and Limitations of Hand Hygiene Promotion on Decreasing Healthcare-Associated Infections

Yee-Chun Chen, Wang-Huei Sheng, Jann-Tay Wang et al, PLoS ONE 6(11): e27163.





**Goals of the Collaborative**

- To reduce the rate of CLAB in NZ ICU's
- To support best practice across NZ
- To establish a robust measurement for CLAB
- To establish a national web-based data base for collection, analysis and sharing of information

**Effect of CLAB on New Zealand ICU's**

- Cost per CLAB estimated to lie between NZ\$ 20,000 and \$ 54,000 each
- 19,000 patients get admitted to ICU per year in NZ
- Approximately 50% will have a central line in situ
- Mortality rate from CLAB has been estimated to lie between 33 and 50%

**Medical Barriers**  
 "This won't get Doc's in to the ICU!"

**Gidborne Hospital**  
 Gidborne hospital is situated on the eastern side of the north island of New Zealand and is separated by a range hills from the rest of the north island. It is a small District Health Board covering a large geographic area serving about 47,000 people. The hospital has around 100 beds and a small & bed ICU/CCU unit, with a maximum 48hr ventilation period. Long distances from the tertiary hospital, poor roads/ flights. A small number of permanent medical staff. Dependant on locum medical staff, who come from a wide range of countries. Due to the size of ICU it was also rolled out to the surgical ward (S).

**Warning Barriers**  
 No! No! No! No! No! No! No!

**Central Line Insertion Bundle**

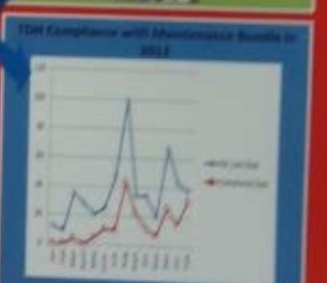
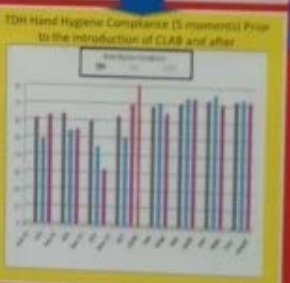
- Optimal site selection
- Hand Hygiene
- Full body drape (sterile field)
- Sterile Gloves, Gown, Towels
- Surgical mask & cap
- Chlorhexidine 2% & 70% alcohol skin prep
- Immediate dressing application (dated)

**Infection Prevention & Control Benefits**

Reminders of hand hygiene in the insertion and maintenance bundle. Adoption of the naked below the elbow. Alcohol Rubs at bed side. Monitoring of compliance to the insertion and maintenance bundles.

**Central Line Maintenance Bundle**

- Hand Washing/Rub before accessing lines
- Scrub ports with Chlorhexidine 0.5% & 20% Alcohol (35 sec)
- Dedicated line for TPN
- Review Daily/ Early removal
- Dressing changes (date & time)



**Progress at TDM**  
 Adopted the CDC definition of a CLAB. Standard approach to obtaining blood cultures. Surveillance process for determining CLAB. Introduction of a national insertion pack. Standardization of the insertion bundle. Standardization of the maintenance bundle. Use of Chlorhexidine impregnated dressing.

**Calibrating Success at TDM in 2012**

**Zero CLAB**

**THE FUTURE**  
 Building on the Success of the Collaborative. Maintaining Zero CLAB. Holding on to the Gains. Continue to contribute to the national data collection. TDM has been CLAB Free for the whole of the project and NZ has been CLAB free for some months in a row.

**Efficacy of a 2% chlorhexidine handwash for hand hygiene in healthcare**

Rachel A. Leslie<sup>1</sup>, Robert R. McCormack<sup>2</sup>, James W. Arbogast<sup>1</sup>  
 1. GOJO Industries, Akron, OH 2. BioScience Laboratories, Bozeman, MT

**Objective**

There is often debate regarding active ingredient levels needed for sufficient antimicrobial efficacy in healthcare. However, this focus on active level is often of low clinical value as the formulation of hand hygiene products has been shown to have a significant impact on efficacy, regardless of the active level<sup>1,2</sup>. Additionally, higher active levels can drive up product prices, which can be a substantial barrier, especially for developing countries in the Asia Pacific. Previous testing with a unique method shows that a 2% CHG hand washes performed at parity with 2 different 4% CHG handwashes<sup>3</sup>. Standardized *in vivo* methods to evaluate the efficacy of products for healthcare hand hygiene are recommended by the WHO and CDC<sup>4,5</sup>. The goal of this study was to evaluate the *in vivo* efficacy of a 2% chlorhexidine gluconate (CHG) handwash with standardized methodology.

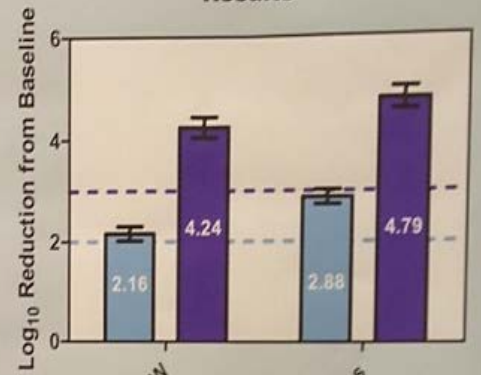
**Methodology**

1994 FDA TFM parts 333 and 369<sup>6</sup> (based on ASTM E1174<sup>7</sup>); Following a 7-day product restriction period, the hands of participants were artificially contaminated with *Serratia marcescens* (ATCC #14756) over the course of 11 consecutive hand contaminations, the first followed by a sample for baseline, and the remaining 10 by product applications, with microbial samples taken after product applications 1, 3, 7, and 10. Participants washed with 5 ml of the test product or the control product (Hibiclenz, 4% CHG hand wash), randomly assigned, for each product application. Mean log<sub>10</sub> reductions of *Serratia marcescens* were the basis for assessing the antimicrobial effectiveness of the products and were calculated after the first and tenth hand contamination/product application. US FDA requirements are mean log<sub>10</sub> reductions in microorganisms ≥ 2 log<sub>10</sub> after Application 1 and ≥ 3 log<sub>10</sub> after Application 10<sup>7</sup>.

**References**

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- WHO. Guidelines on Hand Hygiene in Health Care. World Health Organization; 2009.
- CDC. Guidelines for Hand Hygiene in Health-Care Settings 2009.
- ASTM International. E-1174. Standard test method for evaluation of the effectiveness of health-care personnel or consumer handwash formulations. West Conshohocken, PA: ASTM International.
- 1994 FDA TFM for Health-Care Antiseptic Drug Products. Proposed Rule parts 333 and 369.

**Results**



- The 2% CHG handwash met the FDA efficacy requirements (2-log<sub>10</sub> reduction at application + 3-log<sub>10</sub> reduction at application 10)
- The positive control, Hibiclenz, performed as expected meeting method efficacy requirements
- Log<sub>10</sub> reductions of Hibiclenz were significantly higher than the 2% CHG handwash at applications 1 and 10, however it is unknown if this difference would be clinically relevant

BioScience Laboratories, Bozeman, MT Study #121014-101

**Conclusions**

- A well formulated 2% CHG handwash can meet standard efficacy requirements; therefore can be effective in acute healthcare wards for hand hygiene
- Active concentration levels should not be the main focus in hand hygiene product evaluations
- Hand hygiene products should be evaluated with *in vivo* efficacy data derived from standardized methods in a thoughtful, evidence-based approach
- Clinical outcome studies may be necessary to determine if advantages in lab-based efficacy with a 4% CHG handwash translates to a real infection prevention benefit



For additional information contact Rachel Leslie, GOJO Industries 1-419-955-6463 email: rleslie@gojo.com

**WHO** xúc tiến các quy định về VSBT và KSNK:  
**“AN TOÀN NGƯỜI BỆNH TRÊN TOÀN CẦU”**

Hướng tới mục đích giảm NK liên quan đến chăm sóc y tế (NKBV) trên khắp thế giới





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9. CDC. Avian influenza A (H7N9) virus. Atlanta, GA: US Department of Health and Human Services, CDC; 2013. <http://www.cdc.gov/flu/avianflu/h7n9-virus.htm>.
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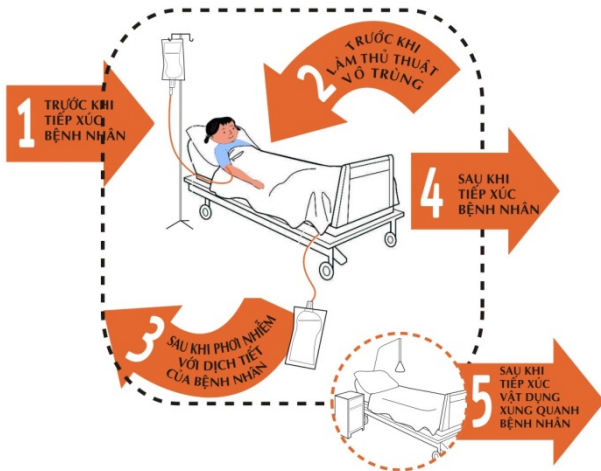
# Các hoạt động

Phát động chiến dịch KSNK  
Chiến dịch rửa tay toàn cầu





# VÌ SỰ AN TOÀN CHO BỆNH NHÂN



**5 THỜI ĐIỂM BẠN CẦN RỬA TAY KHI CHĂM SÓC BỆNH NHÂN**



## BÀN TAY SẠCH

Ngăn ngừa mọi bệnh tật  
Đảm bảo cuộc sống an toàn hạnh phúc



# HÃY RỬA TAY!

Tài trợ bởi  
**Johnson & Johnson**  
(VIETNAM) CO., LTD.



HỘI ĐỒNG KSNK  
“VÌ SỰ AN TOÀN CHO BỆNH NHÂN”

## CHỈ MẤT 30 GIÂY ĐỂ RỬA TAY



Bạn có thể phòng ngừa lây nhiễm cho bệnh nhi và chính mình.



## NĂM AN TOÀN NGƯỜI BỆNH 2013

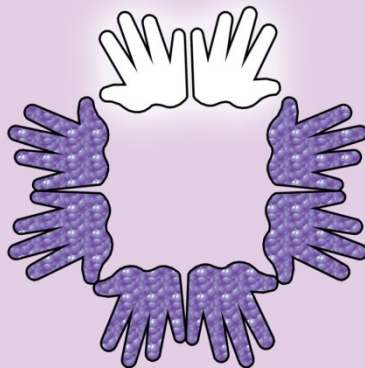


**TOÀN THỂ NHÂN VIÊN Y TẾ BỆNH VIỆN NHI ĐỒNG 1  
TĂNG CƯỜNG TUÂN THỦ VỆ SINH TAY**



VÌ SỰ AN TOÀN CHO BỆNH NHÂN

**CẮT ĐỨT CON ĐƯỜNG LÂY BỆNH - HÃY RỬA TAY**



Để phòng ngừa các bệnh truyền nhiễm:  
tay chân miệng, cúm, sởi, thủy đậu,.....

*Hãy dạy trẻ  
biết rửa tay*





**HICS cần sự tham gia của tất cả mọi người**