



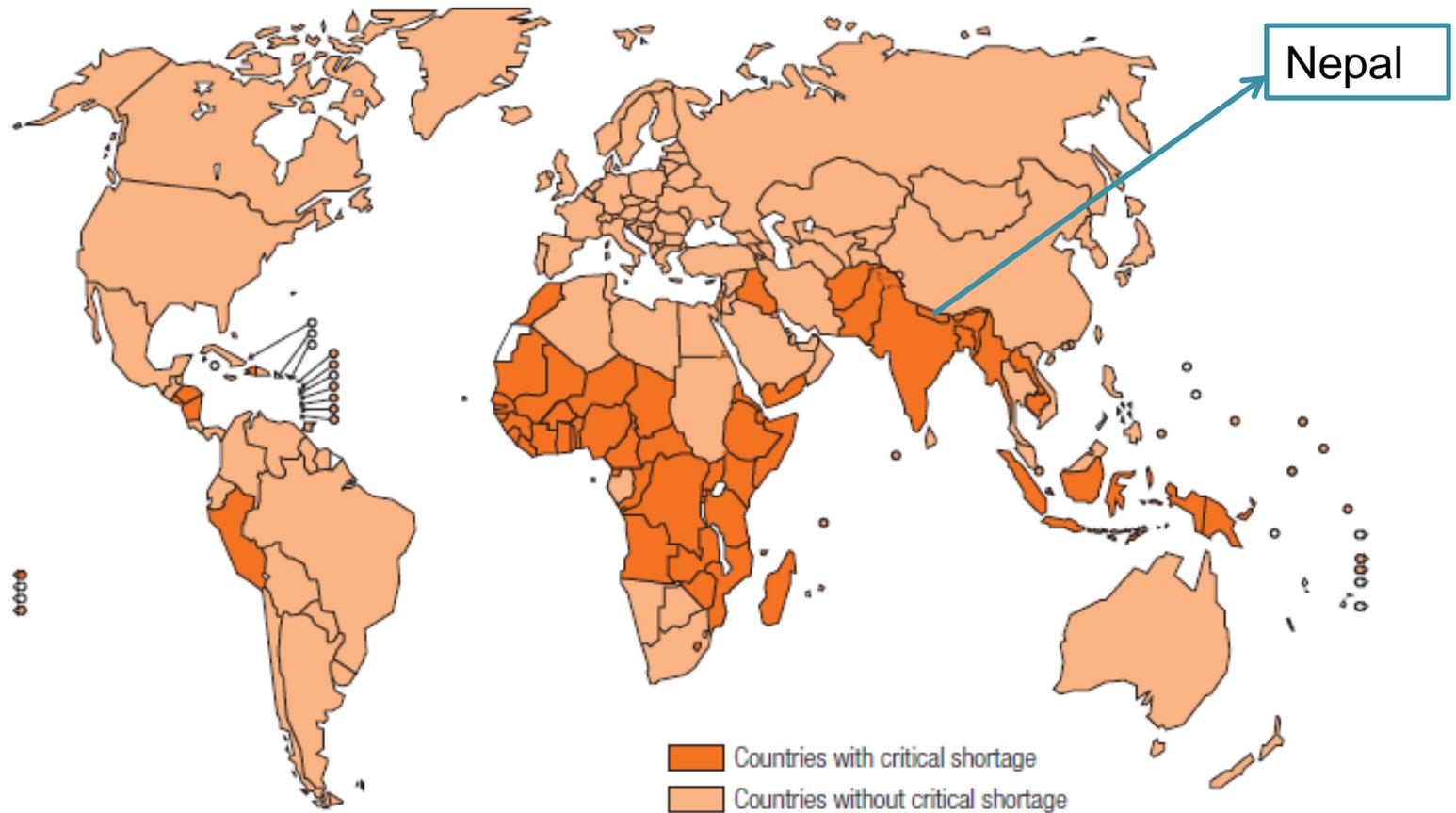
# ◦ Doctor's Brain Drain in Nepal:

Exploring Patterns, Causes, Consequences &  
Solutions

July 21, 2013

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GraSPP, MPP/IP

# 57 Countries with a Critical Shortage of health service providers (Doctors, nurses and midwives)



Source: WHO, *The World Health Report 2006*

# Research Questions

- How many Doctors are migrating?
- Why they are migrating?
- What are the consequences?
- What could be the practical solutions?

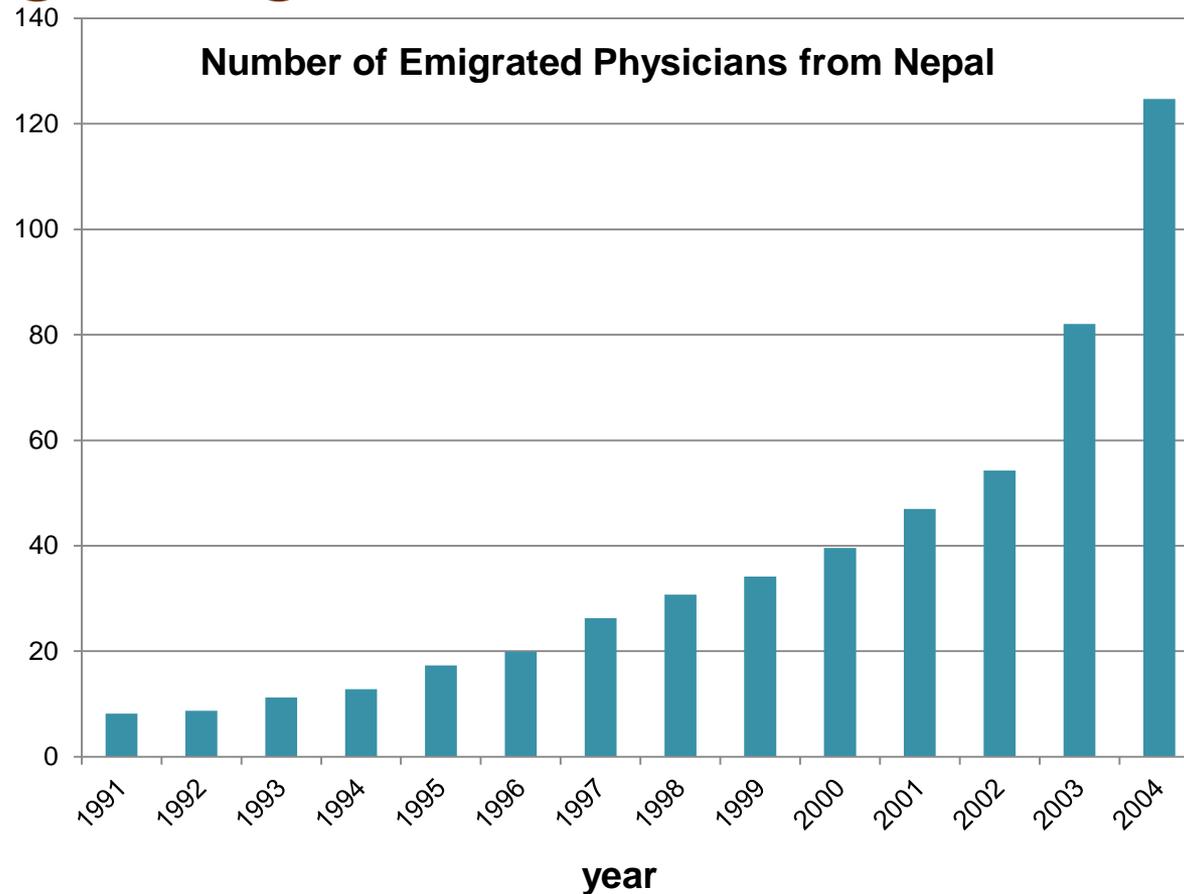
# Data, Method and Variables

- Data:
  - Bhargava A., Docquier F., & Moullan Y. (2010).. Emigration data: data set 1991-2004
  - Zimmerman M. et al. 2012. Institute of Medicine graduates' migration data set for 1983-2004
- Descriptive method with qualitative analysis
- Doctors' emigration - dependent variable
- Immigration policy of receiving country, Push/Pull/enabling factors – independent variable

# Hypotheses

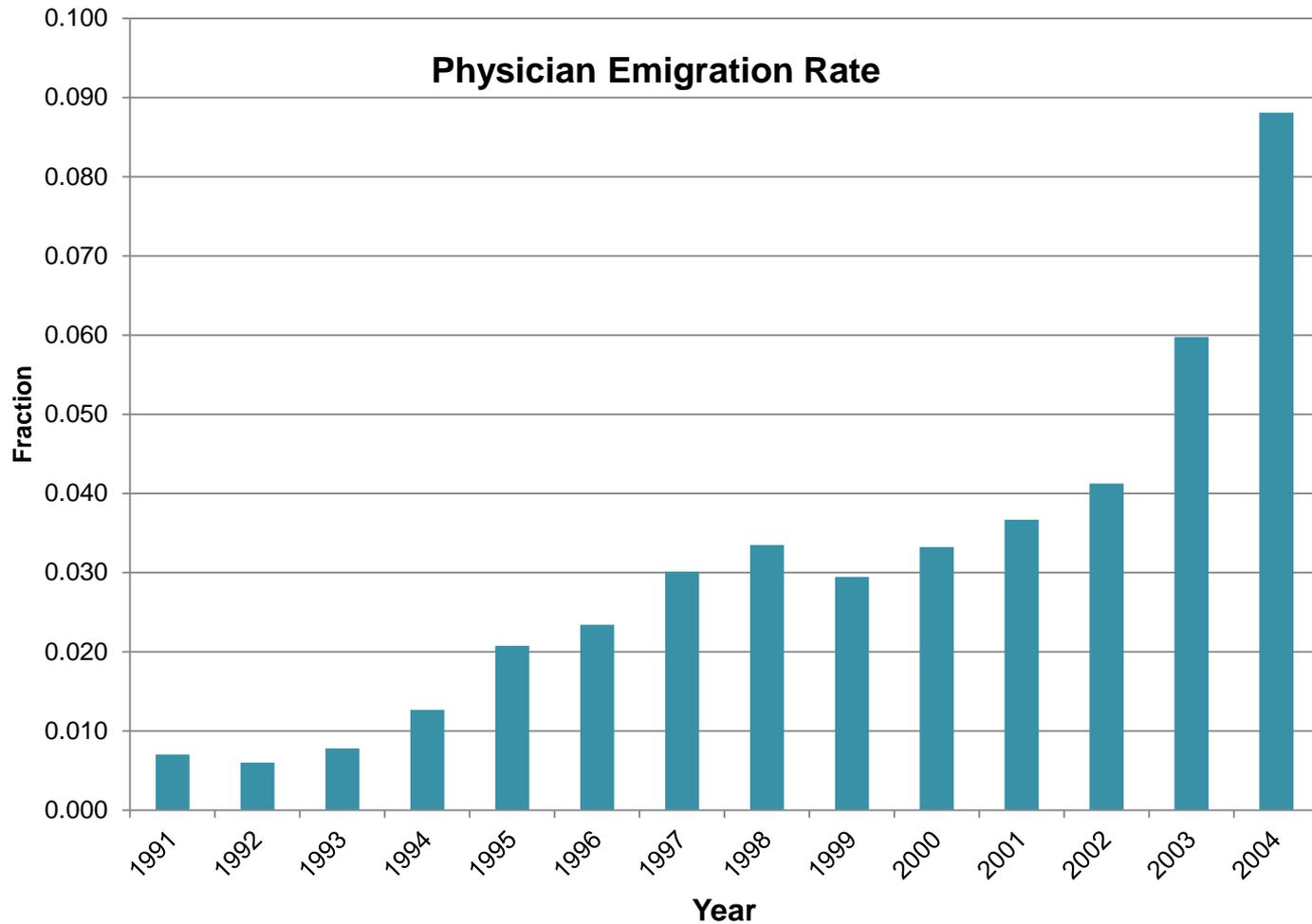
- There is significant prevalence of doctors brain drain in Nepal.
- Receiving country's immigration policy is the key factor for the doctors' emigration from Nepal.
- There are adverse effects of doctors' emigration on health outcomes, coverage and educational investment.

# How many doctors are migrating?



*Data source: Bhargava et al.  
2012*

# Migration rate?



*Data source: Bhargava et al.  
2012*

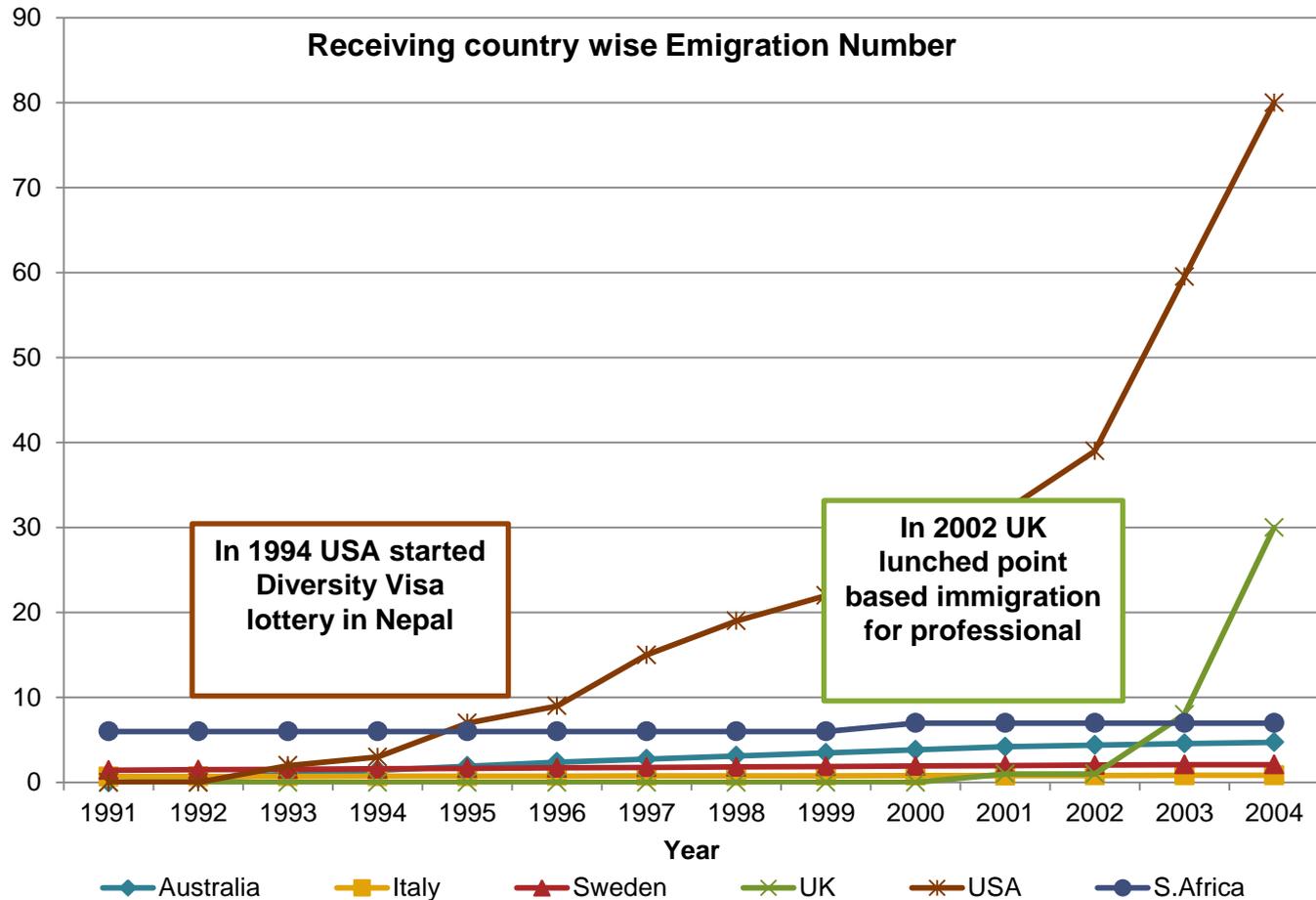
# Migration rate?

Institute of Medicine (IoM) Graduates practicing in and outside Nepal



*Source: Zimmerman et al. 2012*

# Where are they going? Why?



Data source: Bhargava et al.  
2012

# Why they are migrating?

- Push Factors

- Lower employment opportunity
- Lower wage
- Poor work environment
- Less opportunity for Professional development
- Political instability

(Nair & Webster, 2012)

- Sociocultural change about profession
- Security threats- physical attack, donation

# Why..?

- Pull Factors
  - Selective Immigration policy
  - High wage rate- >18 times in USA
  - Employment opportunities and career development
  - Proximity and family links  
(Nair and Webster, 2012)
- Enabling Factors
  - Democracy- enter into globalized world
  - Internet - 1993

# Consequences...health outcomes

## Some Health related Millennium Development targets and their progress

	1990	2000	2005	2010	2015 (Target)
<b>GOAL: 4 REDUCE CHILD MORTALITY</b>					
<b>Reduce by two thirds, between 1990 and 2015, the under-five mortality rate</b>					
Under-five mortality rate	162	91	61	50	54
Infant mortality rate	108	64	48	41	34
Proportion of one-year olds immunized against measles	42	71	85	85.6	>90
<b>MDG GOAL 5: REDUCE MATERNAL MORTALITY</b>					
<b>Target 5.A: Reduce by three-quarters, between 1990 and 2015, the maternal mortality ratio</b>					
Maternal Mortality Ratio (MMR)	850	415	281	229	213
Proportion of births attended by skilled health personnel	7	11	19	28.8	60

Source: MDGs Progress Report Nepal, 2010

# Consequence.. Investment forgone

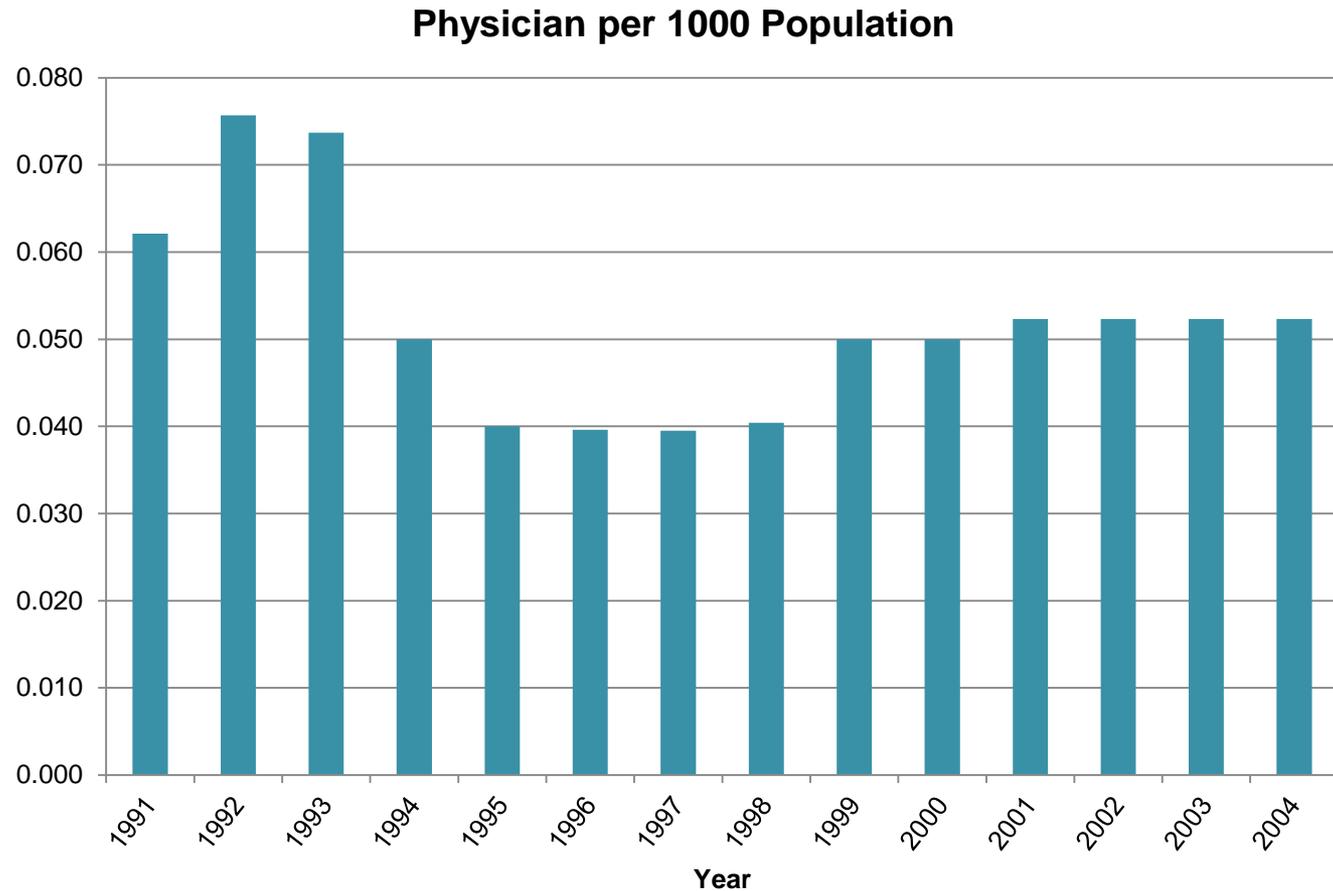
## Estimation:

Each year government of Nepal is losing its **10.85 to 18.2 million USD direct investment- tuition fee waived**-from doctors emigration.

## Assumptions:

- ✓ 350 doctors emigrate each year
- ✓ Tuition subsidy- 31,000- 52,000 USD  
(1 USD=95.59 NPR July 20, 2013 rate)

# Consequences.. In population coverage



*Data source: Bhargava et al.  
2012*

# Conclusions

- Doctors emigration has been rapidly increasing , (>50 %) in recent years.
- USA and UK are the major receiving countries for Nepalese doctors.
- Selective Immigration policy of USA and UK seems to act as a dominant pull factor for doctors emigration in Nepal.
- Despite high emigration rate, health outcomes seem to be not affected adversely.. Further analysis required .
- The estimate loss of investment (10.85-18.2 million USD) is a significant loss for Nepal.

# Policy recommendations

- Nepal's policy stand should be clear- producing doctors for domestic market or international market?
- If domestic market is priority- then the findings of Zimmerman et al.(2012) are practical to implement- selecting rural based or paramedics student.....
- Before being late, Nepal should initiate bilateral negotiations with USA and UK to reduce the loss based on International code of practices to make win-win situation.
- National demand focused curriculum should be made and Psycho-social courses may be desirable, at least to mitigate the following kinds of existing consequences.....

# Docs' shortage affects services in Koshi Hospital

**BHIM GHIMIRE &  
BEDRAJ POUDEL**  
BIRATNAGAR, JULY 15

**S**EVERE shortage of doctors has affected the medical services at the Koshi Zonal Hospital in Biratnagar.

High doctor-to-patient ratio has prompted the hospital authorities to cut down health services. The hospital has even started refusing to admit patients in some cases.

**The hospital visited by large crowds of patients due to affordable fees has stopped receiving delivery cases that require surgery as there are only two doctors in its maternity ward**

The maternity ward in the hospital is largely vacant these days after it stopped handling complicated pregnancies. The hospital used to receive the second largest crowd of pregnant women in the country after the Paropakar Maternity and Women's Hospital in Kathmandu. It has been nearly a week since the hospital stopped receiving delivery cases that require surgery.

Dr Umakanta Jha, the hospital's medical superintendent, said they could not handle all maternity

cases as they had only two doctors in the ward.

Two months earlier, two doctors from the gynecology department retired from their jobs. Five more doctors resigned shortly after, putting the hospital into trouble it has yet to recover.

"There were two other doctors who were offering voluntary services in the maternity department but they left for Kathmandu on Friday. Their departure had a big impact in the maternity service and we had to stop receiving women with complicated pregnancies." Meanwhile, patients like Jayanti Chaudhary, who cannot afford to go to private hospitals, wait outside the maternity ward, struggling with labour pain with no one around to offer medical help.

There are around 30 hospitals and nursing homes in Biratnagar Submetropolis, yet the Koshi Zonal Hospital sees a large crowd of patients due to affordable services. The hospital has 53 posts for government doctor while the Hospital Development Committee can also appoint doctors as required.

According to Dr Jha, the shortage of doctors has affected the departments of ENT, Orthopedics, Radiology, Dermatology, Dentistry, Pathology, Pediatrics, and Obstetrics and Maternity. "It is hard to find doctors who are willing to work for government hospitals because of low pay compared to the private ones. They can run a private clinic and earn more than what is paid in government hospitals," Dr Jha said. "Even the Health Ministry has not been able to fill the vacant posts."

**Severe Shortage of doctors has affected the medical services at the Koshi Zonal Hospital Biratnagar (the second largest city in Nepal)**

...It is hard to find doctors who are willing to work for government hospitals because of low pay. Even the Health Ministry has not been able to fill the vacant posts.

*Source: The Kathmandu Post, July 15, 2013*

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Questions  
Comments  
Suggestions

# WMA statement

- “The World Medical Association at its General Assembly meeting held in Helsinki, Finland in September 2003 adopted a statement declaring that every country should do its utmost to educate adequate number of Physicians taking into account its needs and resources. No country should rely on immigration from other countries to meet its needs. Countries wishing to recruit physicians from another country should only do so through a Memorandum of Understanding between the concerned countries”