



**BUDDHIST TZU CHI GENERAL HOSPITAL,
TAIPEI BRANCH**
財團法人佛教慈濟綜合醫院臺北分院

**Guard Life,
Guard Healthy,
Guard Love**

Medical plastic waste recycling effectively reduces amount and cost of biomedical waste produced

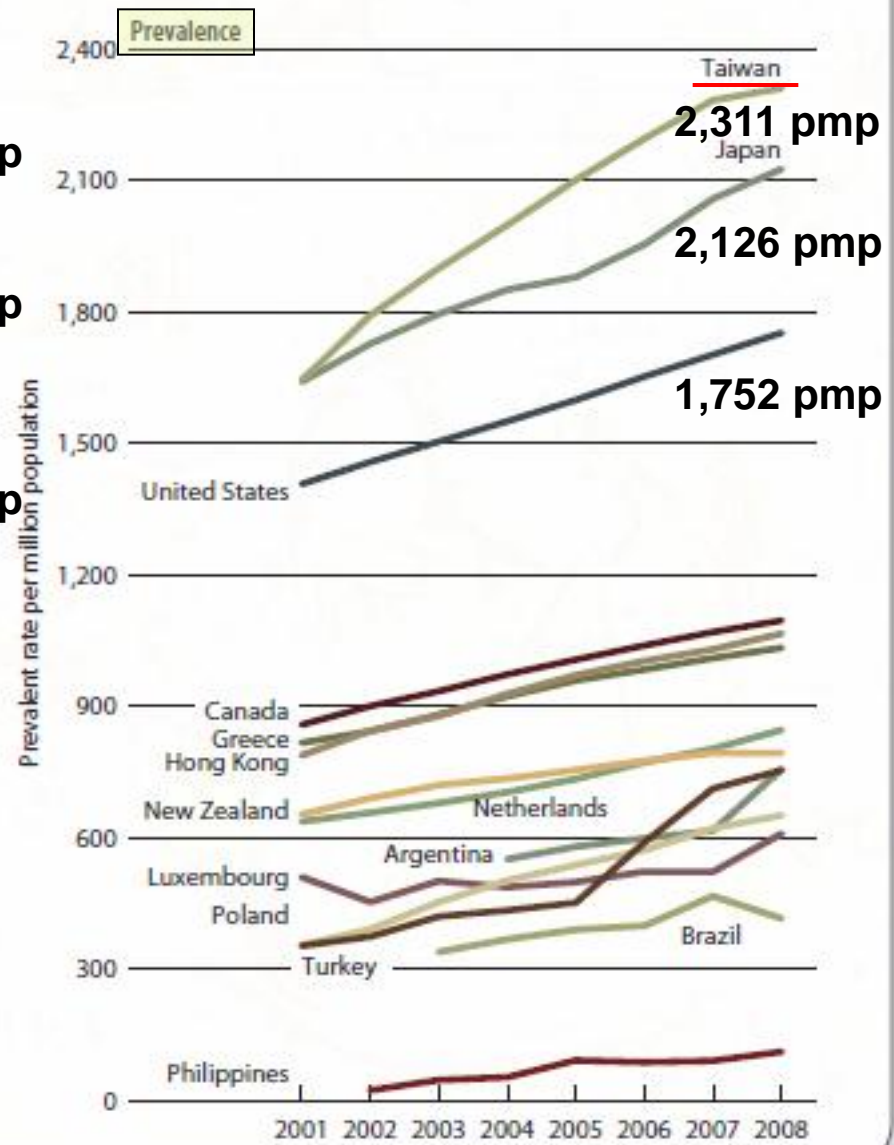
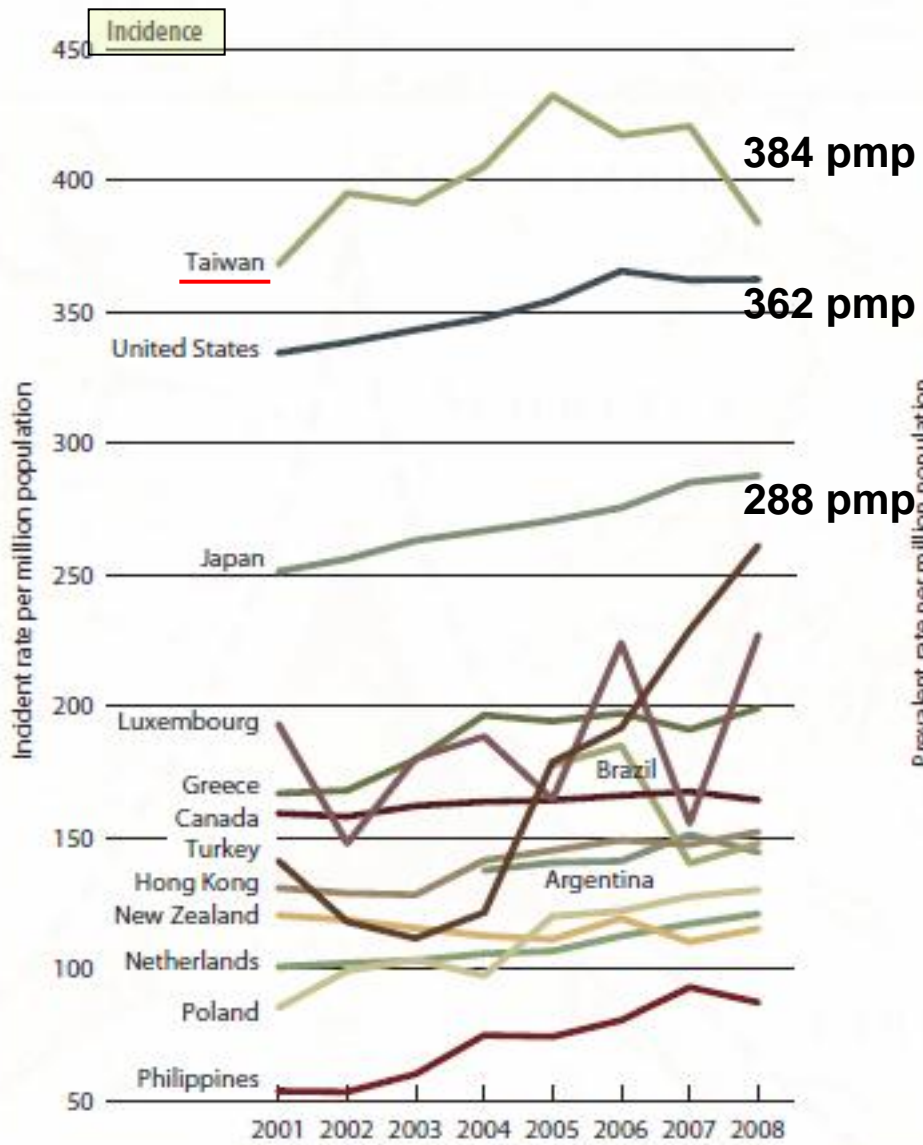
Ying-Jen CHIANG, Jie-Ying WU, You-Chen CHAO

The 19th International Conference on Health Promoting
Hospitals & Health Services

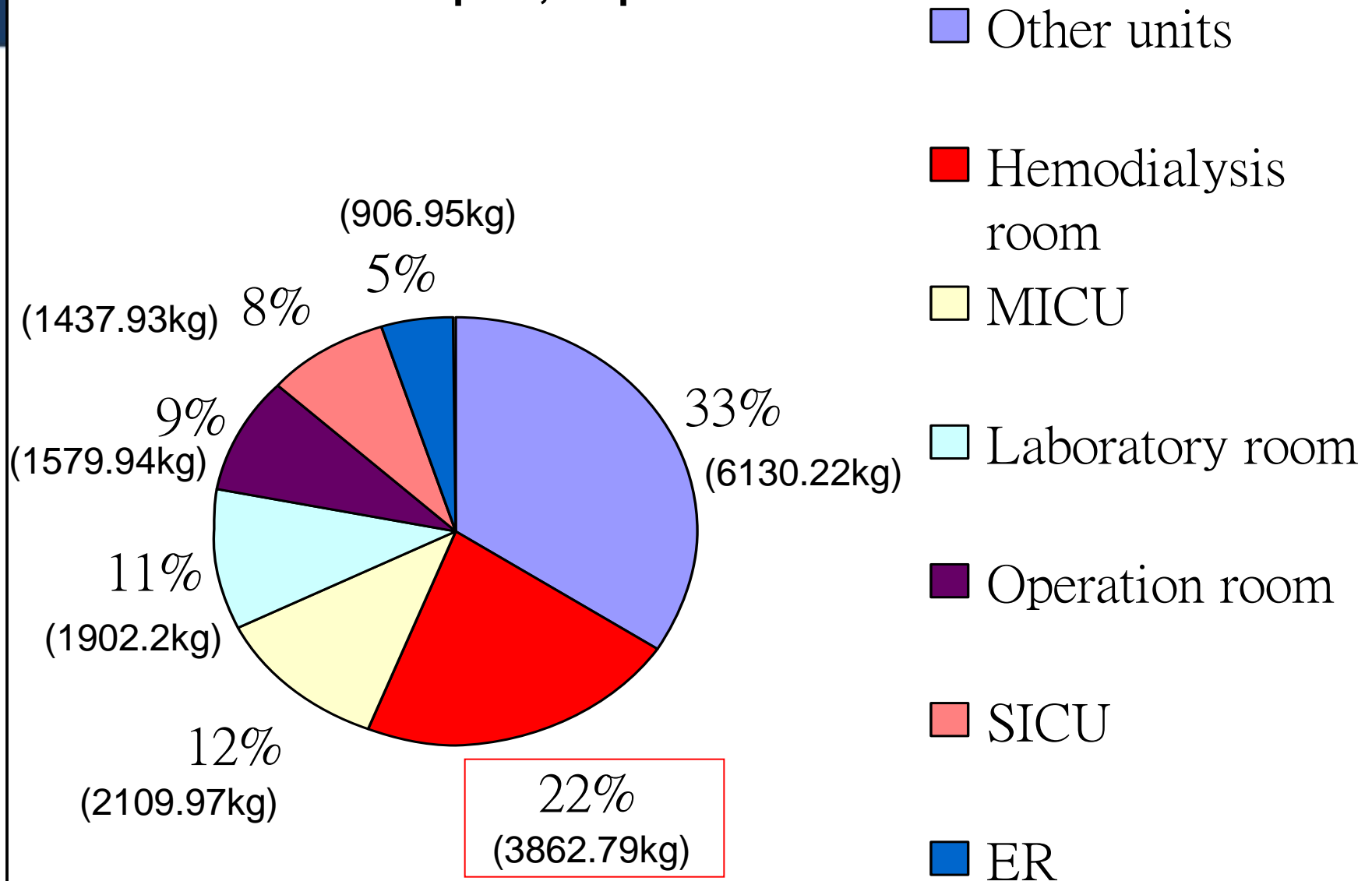
Oral Session 3.4: Healthcare ecology & Diverse

June 3rd, 2011

1 ii Comparison of unadjusted ESRD incidence & prevalence worldwide



Biomedical waste production in different units at Tzu-Chi General Hospital, Taipei branch





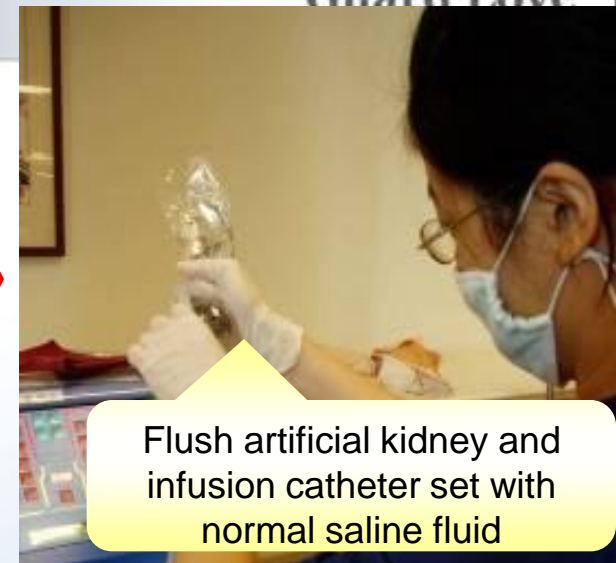
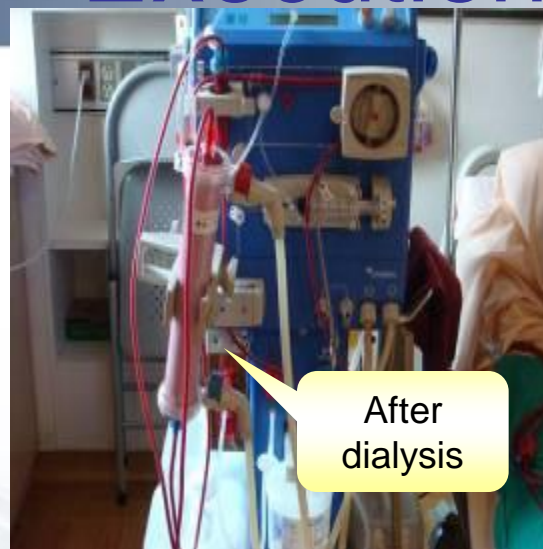
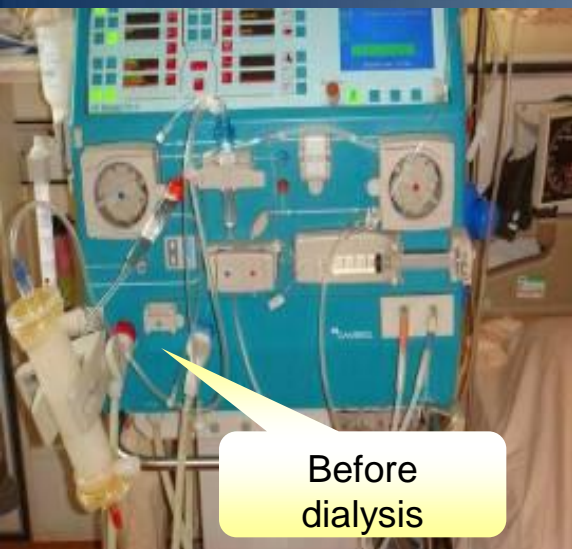
Biomedical waste at our hemodialysis room

- Monthly production: 3862.79kg
- Daily production per patient: 1.22kg
- Monthly cost of waste management: \$123,609NTD
- Our goal: decrease by 30%



Execution

Guard Life,
Guard Healthy,
Guard Love

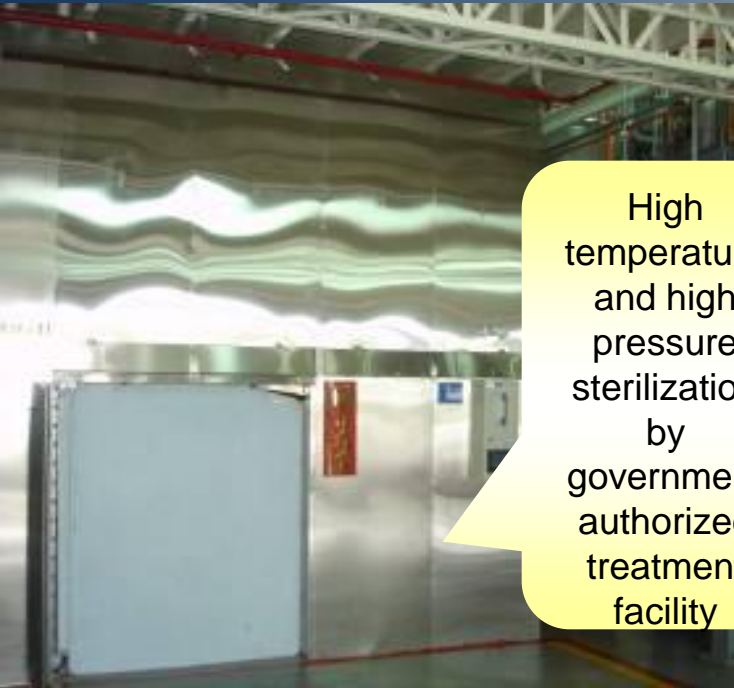




Recycled artificial kidney and
infusion catheter



Segregated into the yellow
infectious waste bag



GENERAL

High temperature and high pressure sterilization by government authorized treatment facility



Sterilized artificial kidney being processed

Life,
Healthy,
Love



Sterilized infusion catheter being processed



Reproduced into industrial plastic fragments and sheets (secondary plastic components)

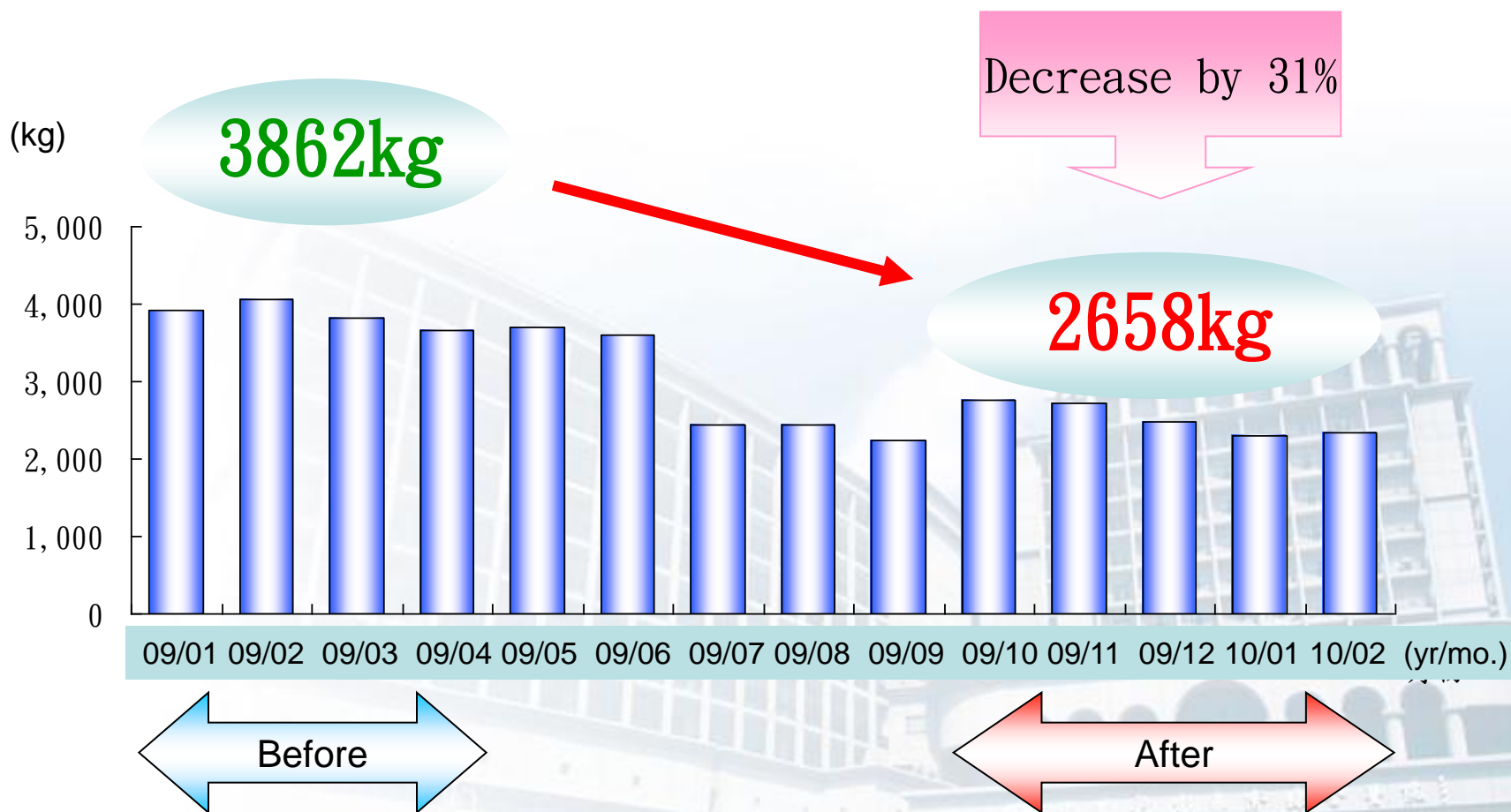


Reused into making the base of shoe or car light shielding and car bumper



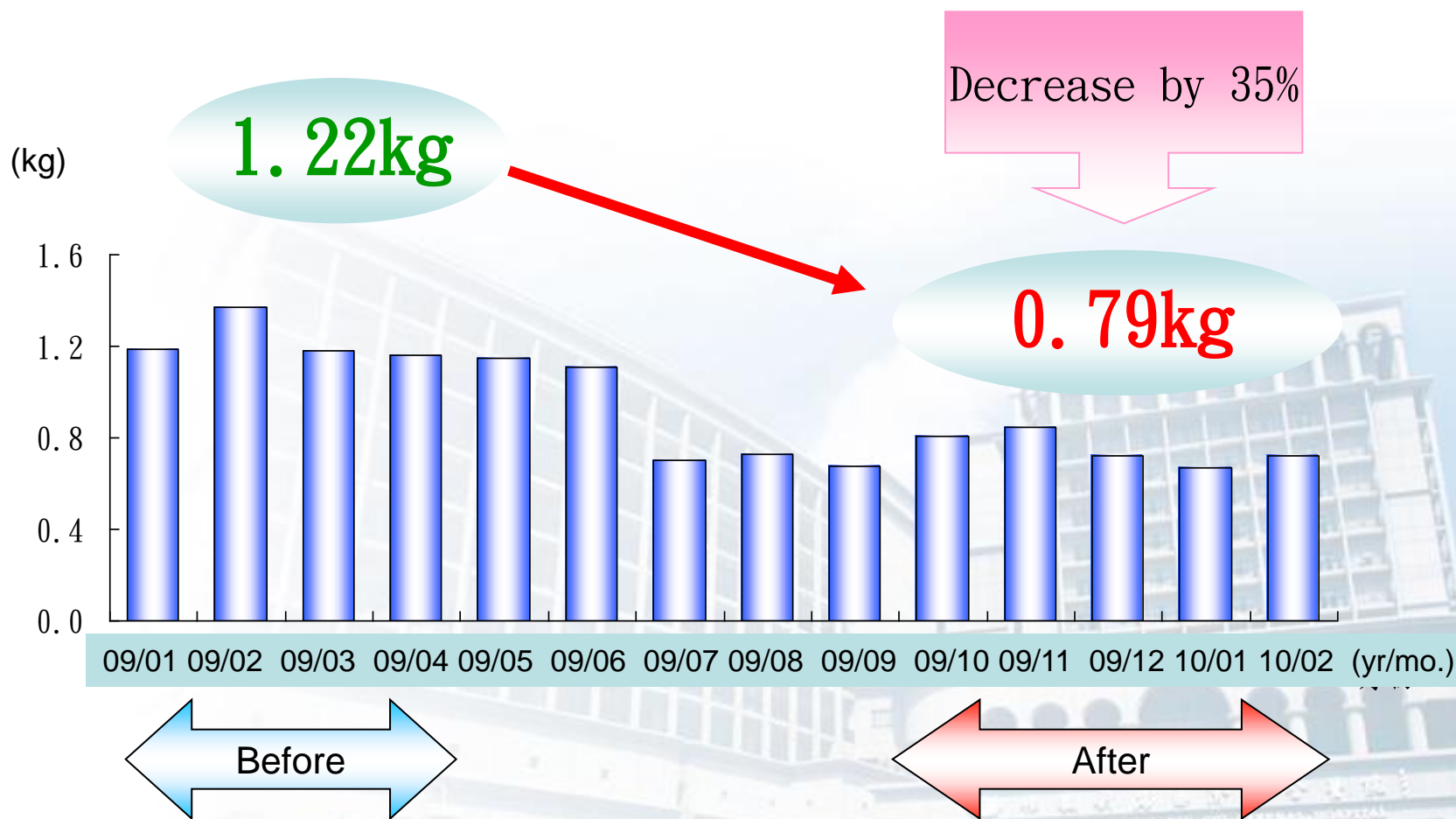
Results

Monthly production of biomedical waste in HD room



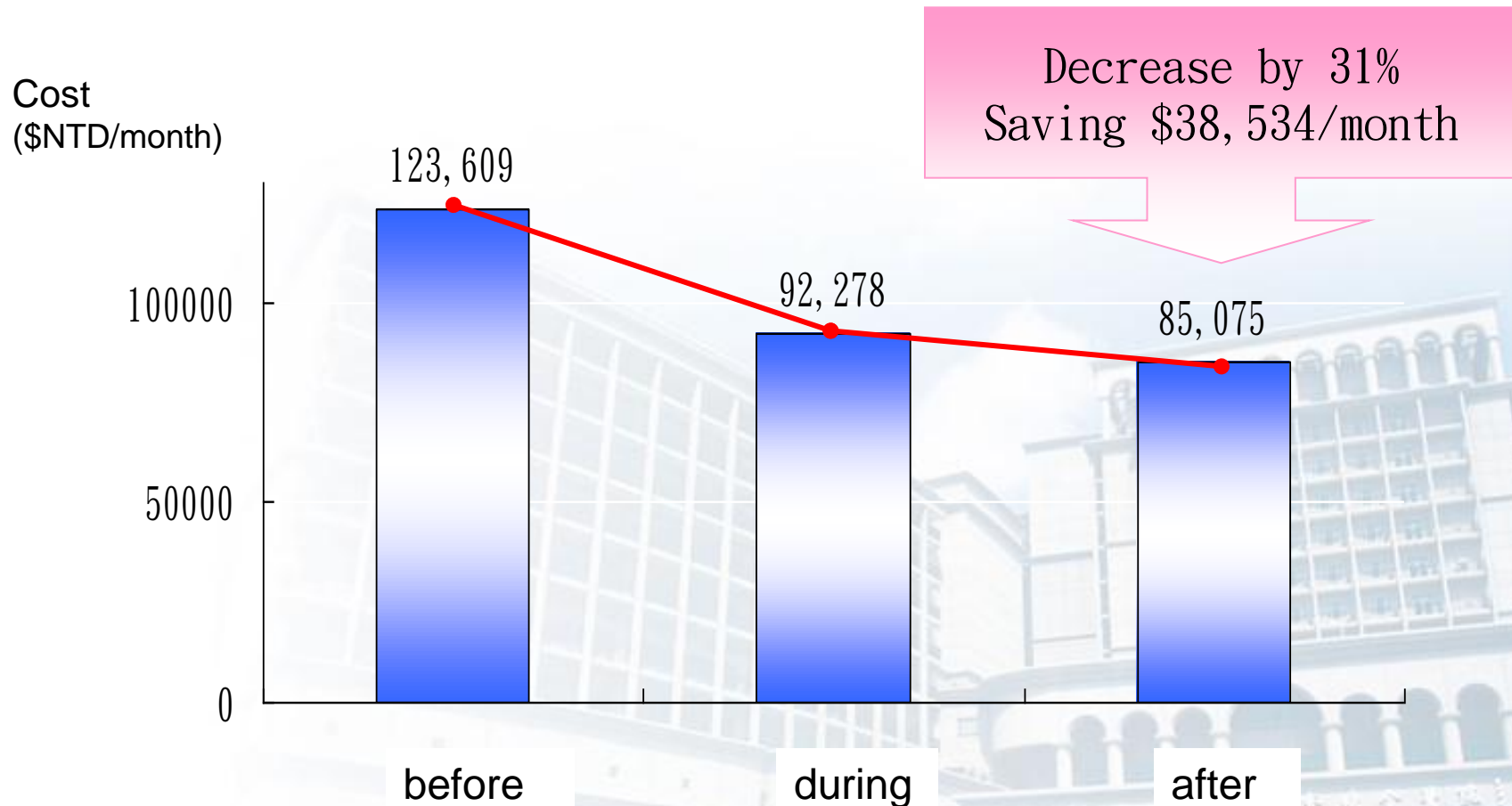


Daily production of biomedical waste per patient





Monthly cost of biomedical waste management





- Recycle
- Reproduce
- Reuse



↓ amount of waste produced
↓ cost of waste management



- Dharma Master Cheng Yen's philosophy on environment protection – **“decrease the use, cherish, and recycle resources.”**
- Reducing biomedical waste produced is a long term goal and duty

From The 2011 TIME 100

