

# Surprise!

The power of the  
emerging world

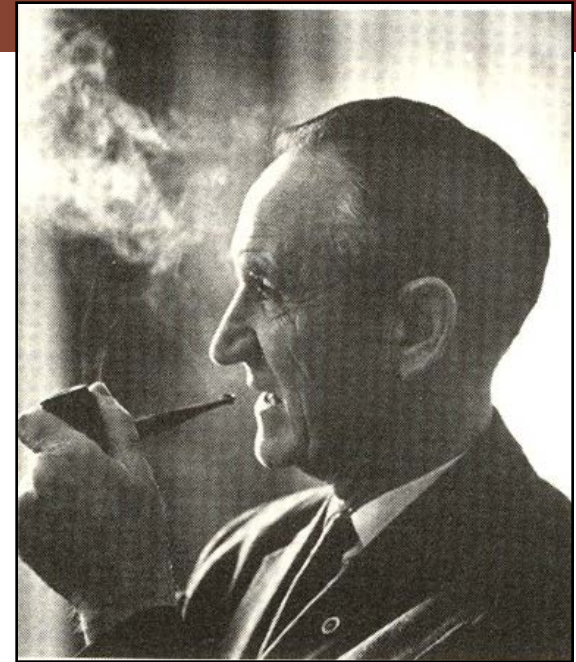




**“I believe that one day America and the other nations clustered along the shores of the Pacific will be neighbors along a lake, a closely interwoven community sharing common interests and common goals.”**

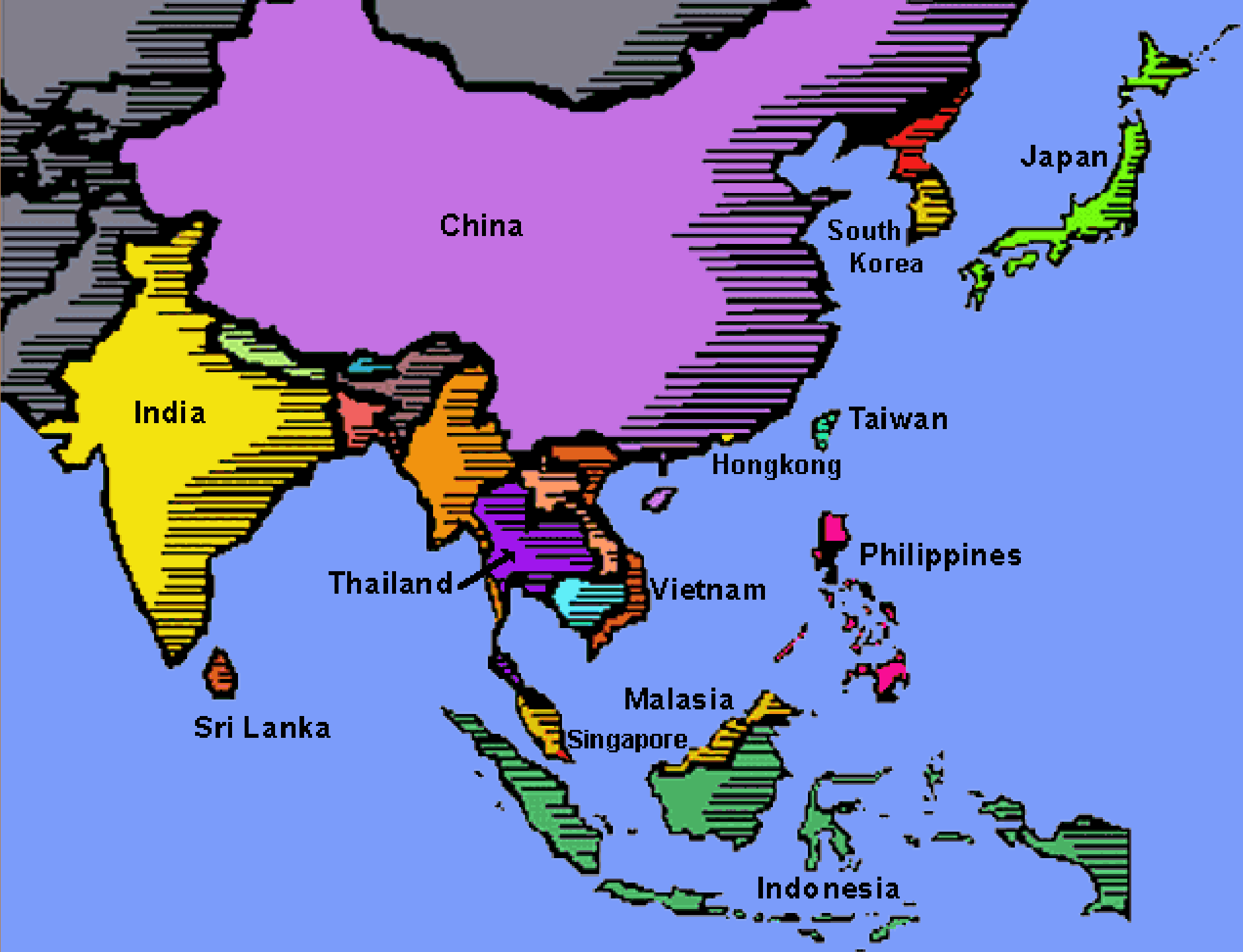
**-Mike Mansfield, March 27, 1980**

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**“There” he growled, pointing his finger at China on a map of the world, “is a sleeping giant. Let him sleep. If he wakes he will shake the world.”**

**-Napoleon Bonaparte, 1803**



China

Japan

South  
Korea

India

Taiwan

Hongkong

Thailand

Vietnam

Philippines

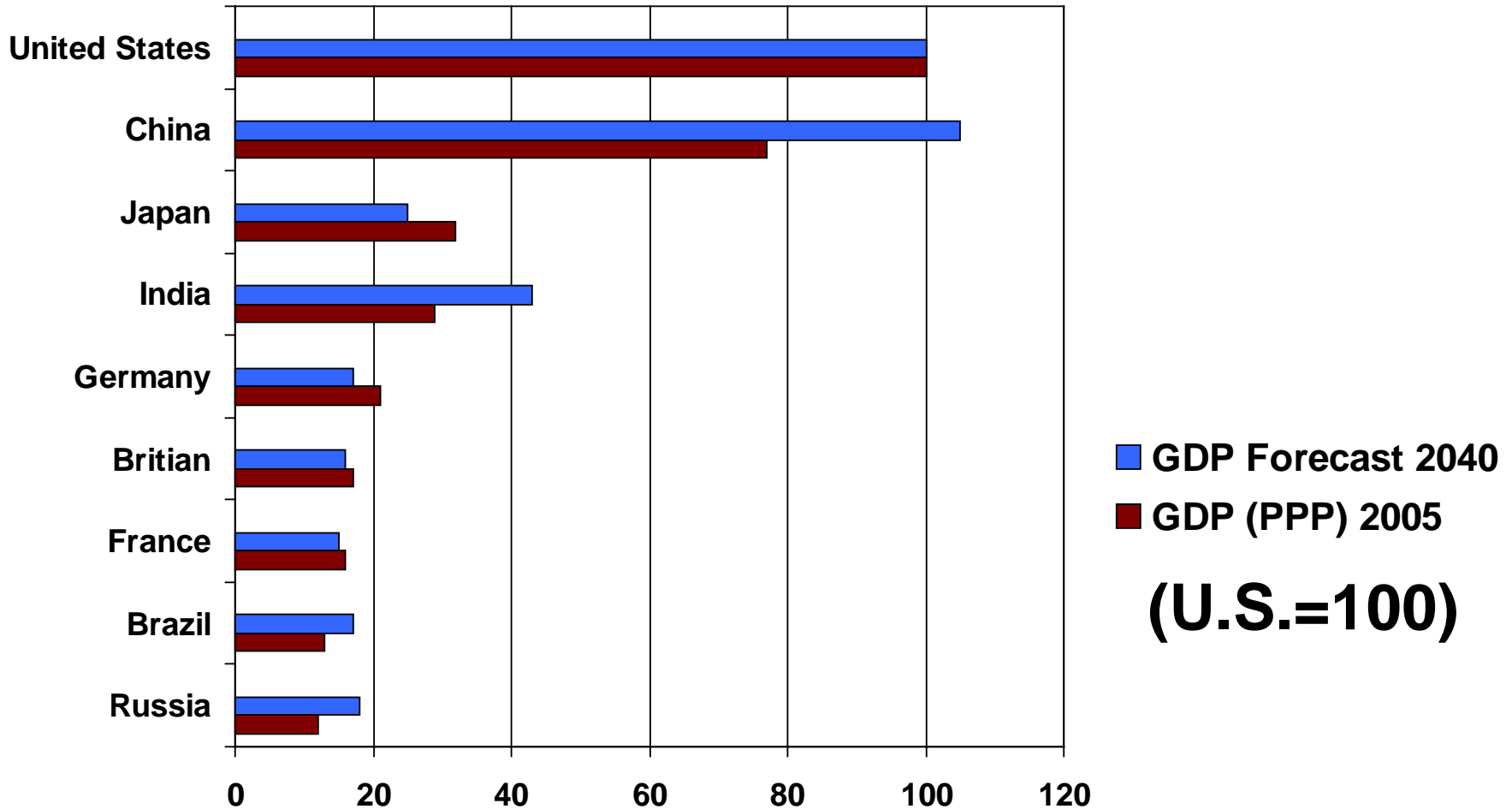
Sri Lanka

Malasia

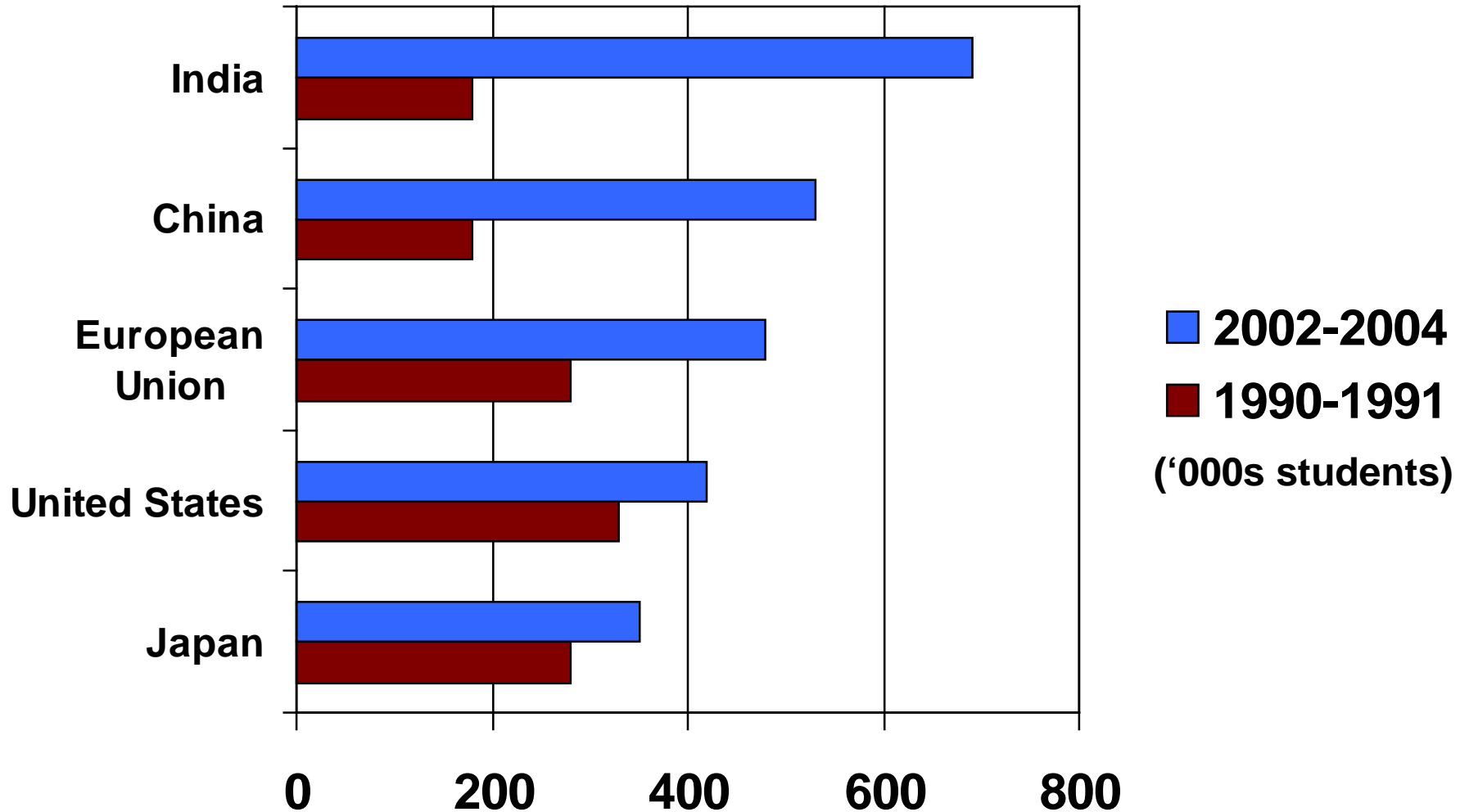
Singapore

Indonesia

# 2040 Vision: World's Nine Biggest Economies



# Body Count, University Students Graduating in Science and Engineering



# America: Love and Hate With Asia

- **War Legacies:**

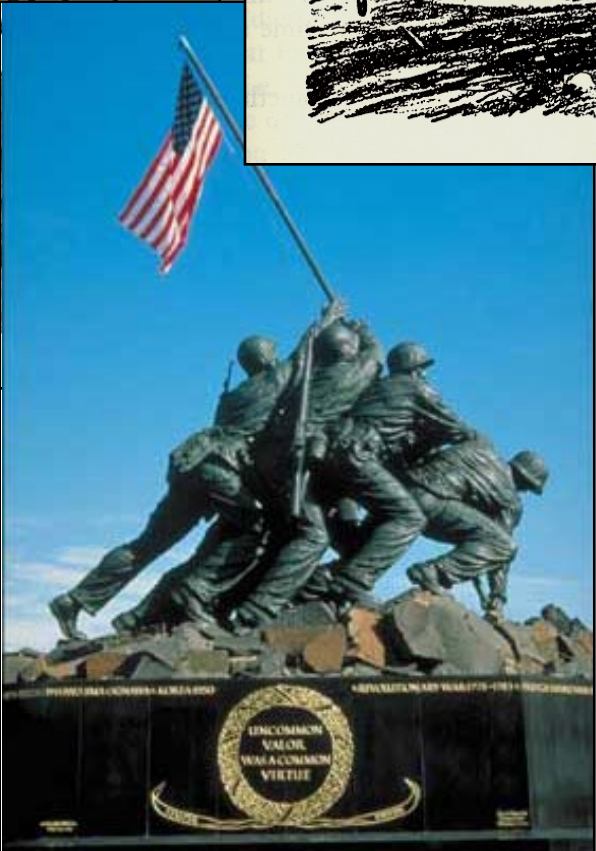
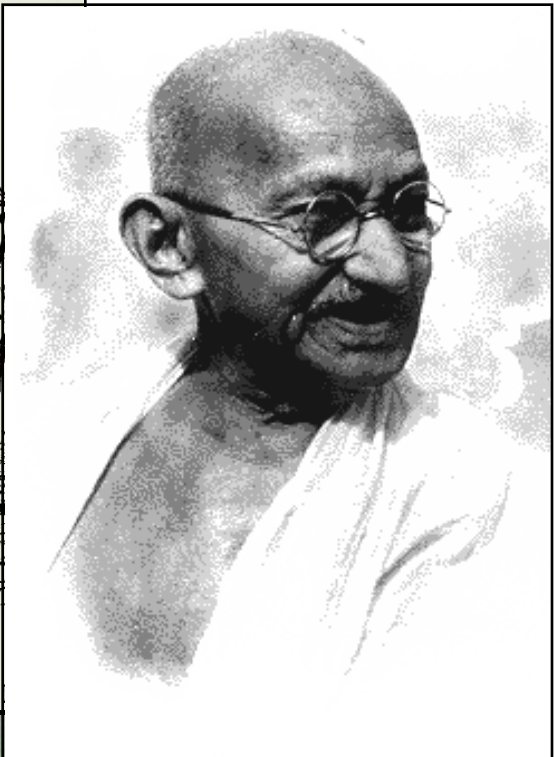
- Japan and World War II
- The Korean War: China and Korea
- The Vietnam War
- “China Mike” and the Asian Cold War

- **Asia as Friends:**

- Asian Workers in Montana History
- Missionary Legacies
- Asian Ideas and Leaders We Admire:  
Gandhi, Yoga, Asian Children...

- **Globalization and Trade**

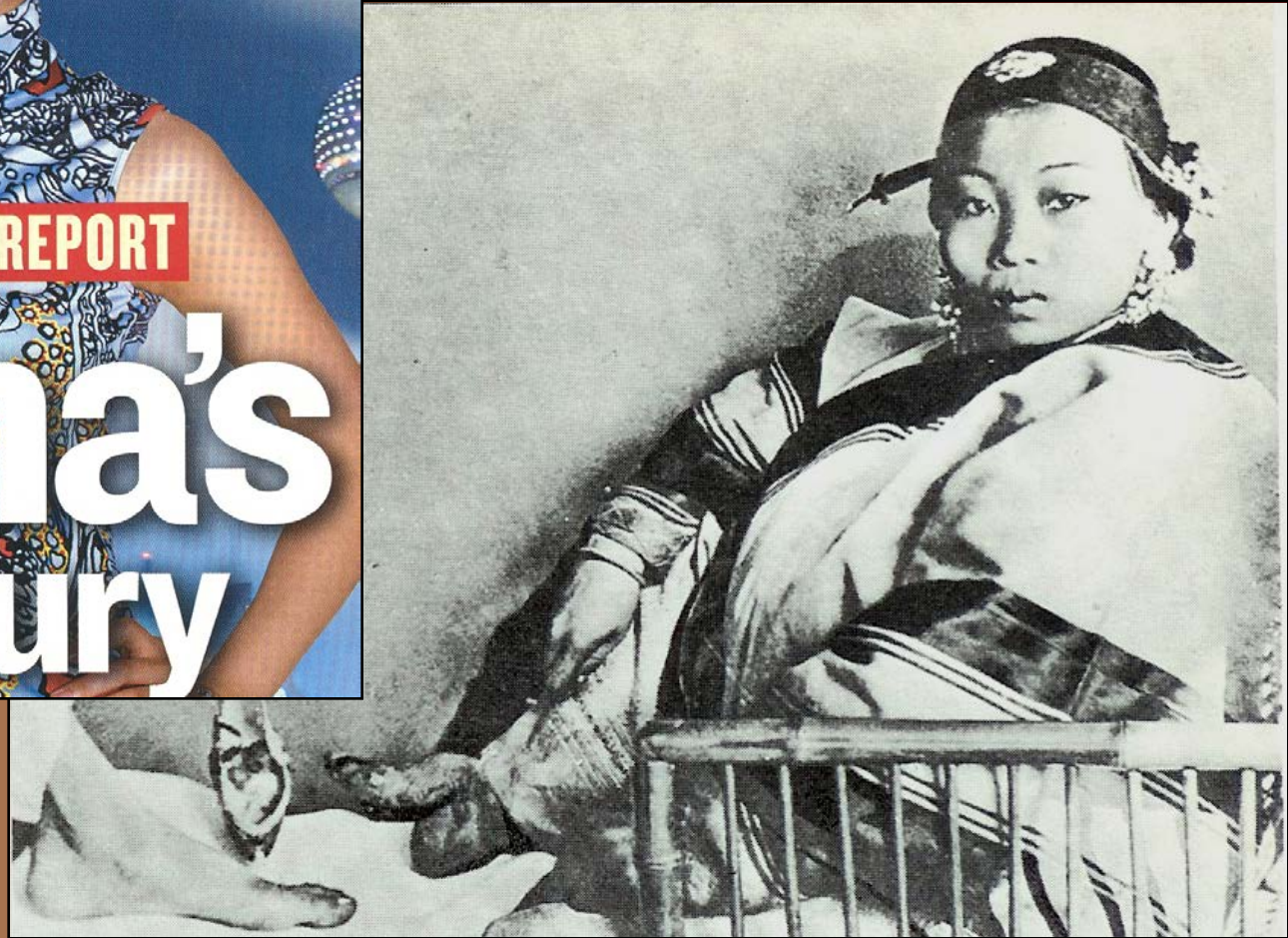
Maybe That's Why They're Called 'Reds'!







## Images of Chinese Women





# China's "Economic Miracle"

- **Shared history, culture, common language**
- **Security and Patriotic Pride (after 1949)**
- **Tradition of science and technology**
- **Policies of Gender Equality**
- **Shift from Mao Zedong to Deng Xiaoping: 1978**
  - End of ideology, Opening to the Outside (1978)
  - Rural Incentives (Abolish communes, 1978)
  - Capitalism with "Chinese Characteristics"

# Rural and Urban China

- Trickle Down, yes
- But Growing Gap



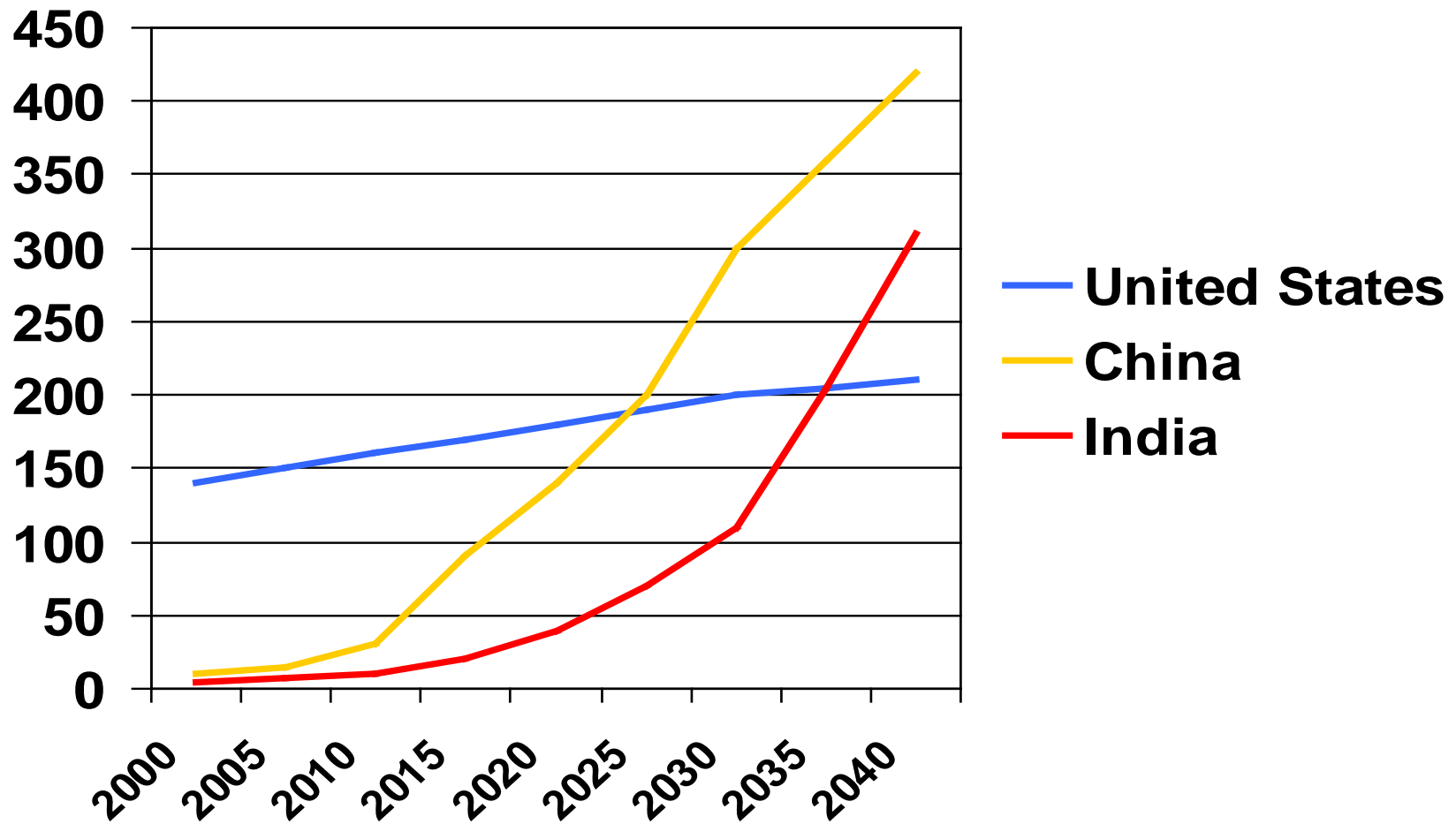
# Lester Brown

(Earth Policy Institute, May 31, 2006)

"The Western economic model -- the fossil fuel based, automobile-centered, throwaway economy -- will not work for China...If it doesn't work for China, it will not work for India or the three billion other people in developing countries who are also dreaming the American dream."

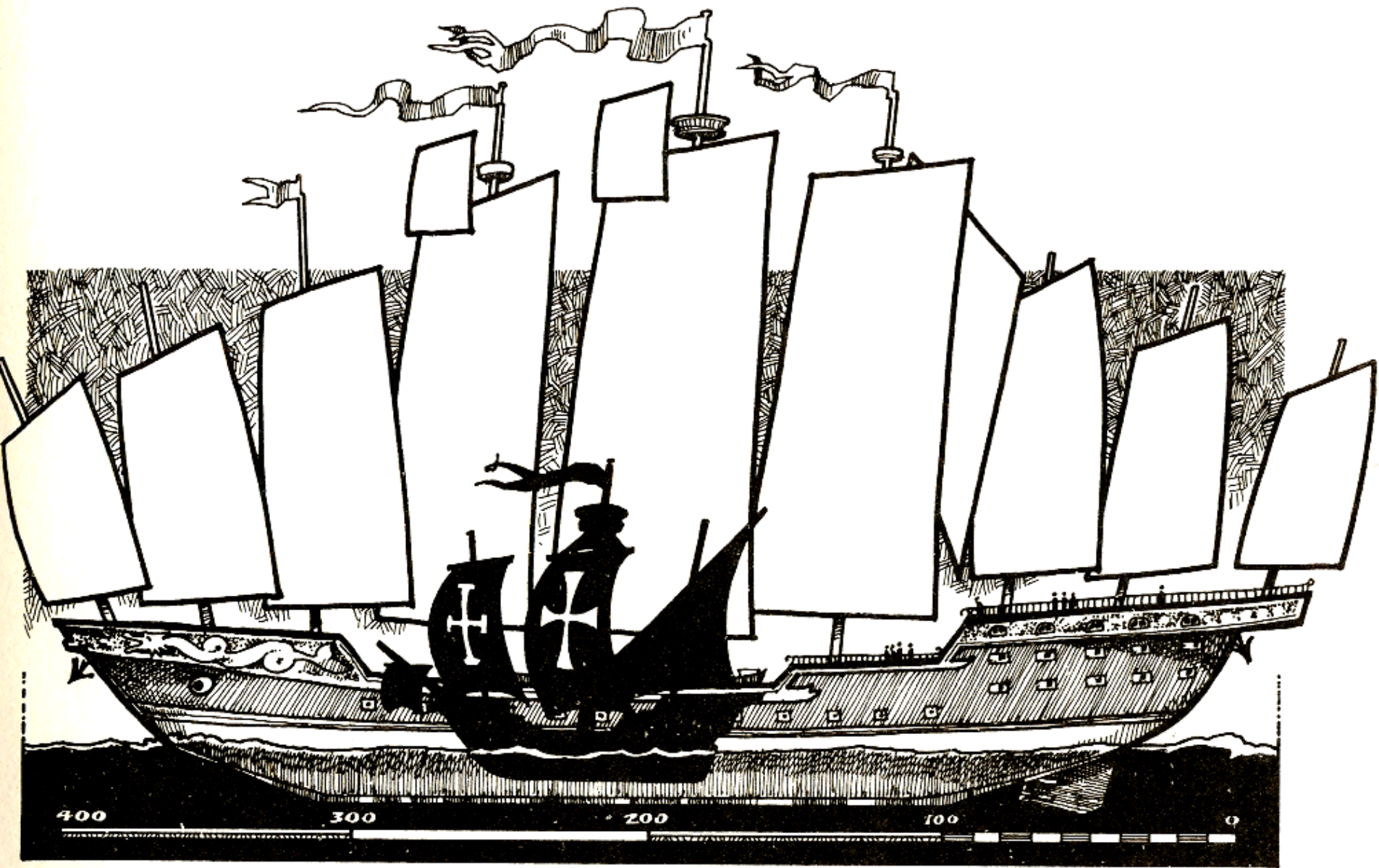


# Future Traffic Jams, Forecasts of Car Ownership



Note: Per 100 people in 2040.

Sources: Goldman Sachs; *The Economist*.



*Zheng He's treasure ship (four hundred feet) and Columbus's St. Maria (eighty-five feet). (Illustration by Jan Adkins, 1993.)*

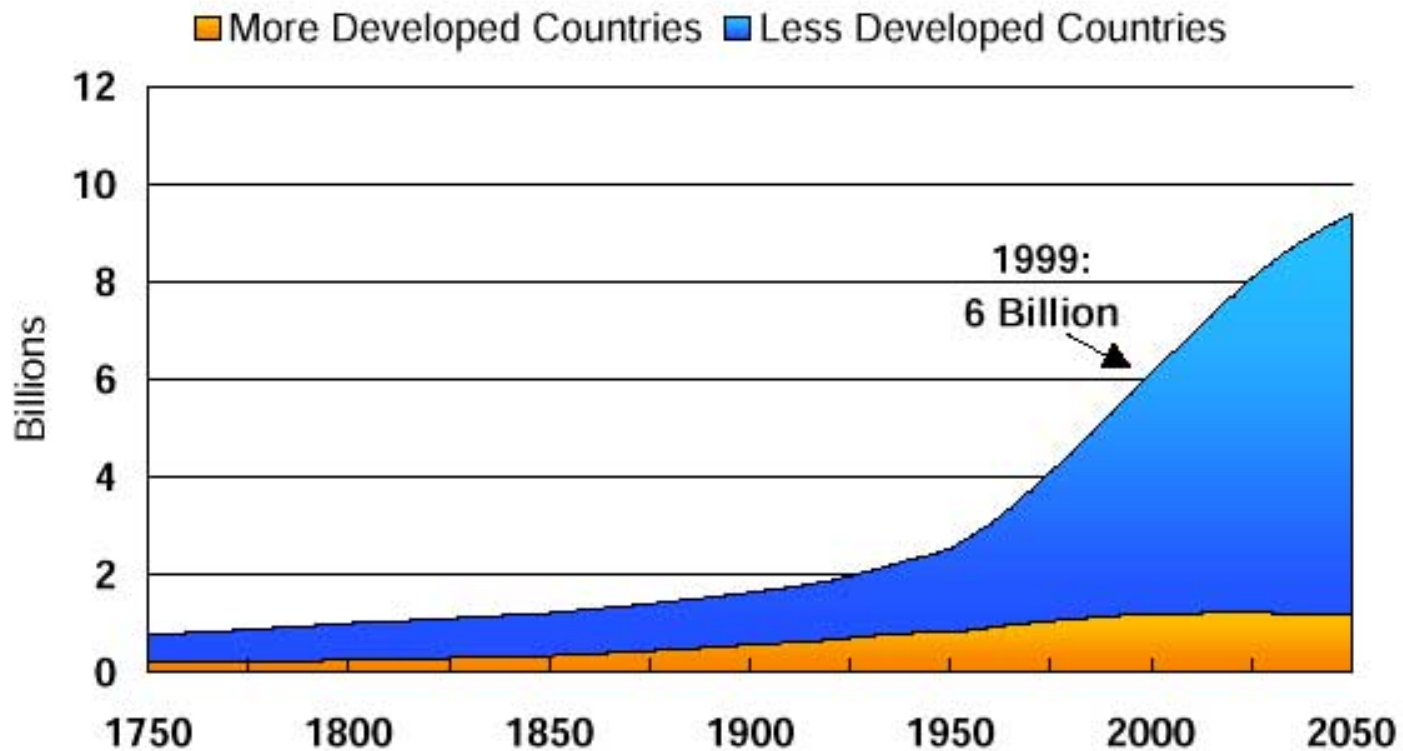
# Chinese Character for Government: Controlling Water-Feeding People

水 = water      治 → 口 = mouth  
zhi

- order, peace, security
- govern, rule, control
- administer, manage



# World Population Growth, 1750-2050

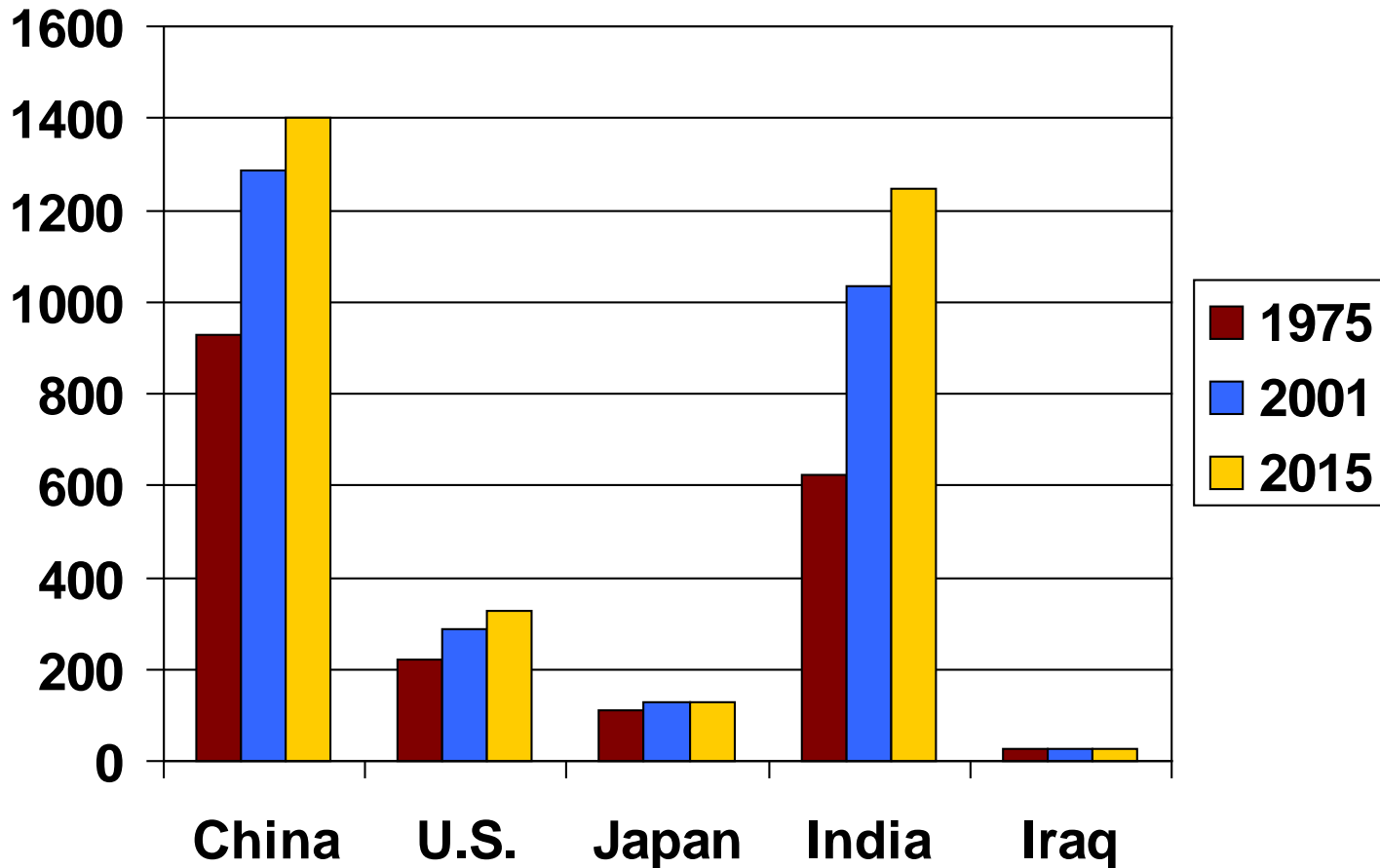


Sources: Before 1950: PRB estimates; 1950-2050: UN, *World Population Projections to 2150*, 1998 (medium scenario).



# Population Growth, 1975-2015 (Millions)

United Nations, Human Development Report, 2003

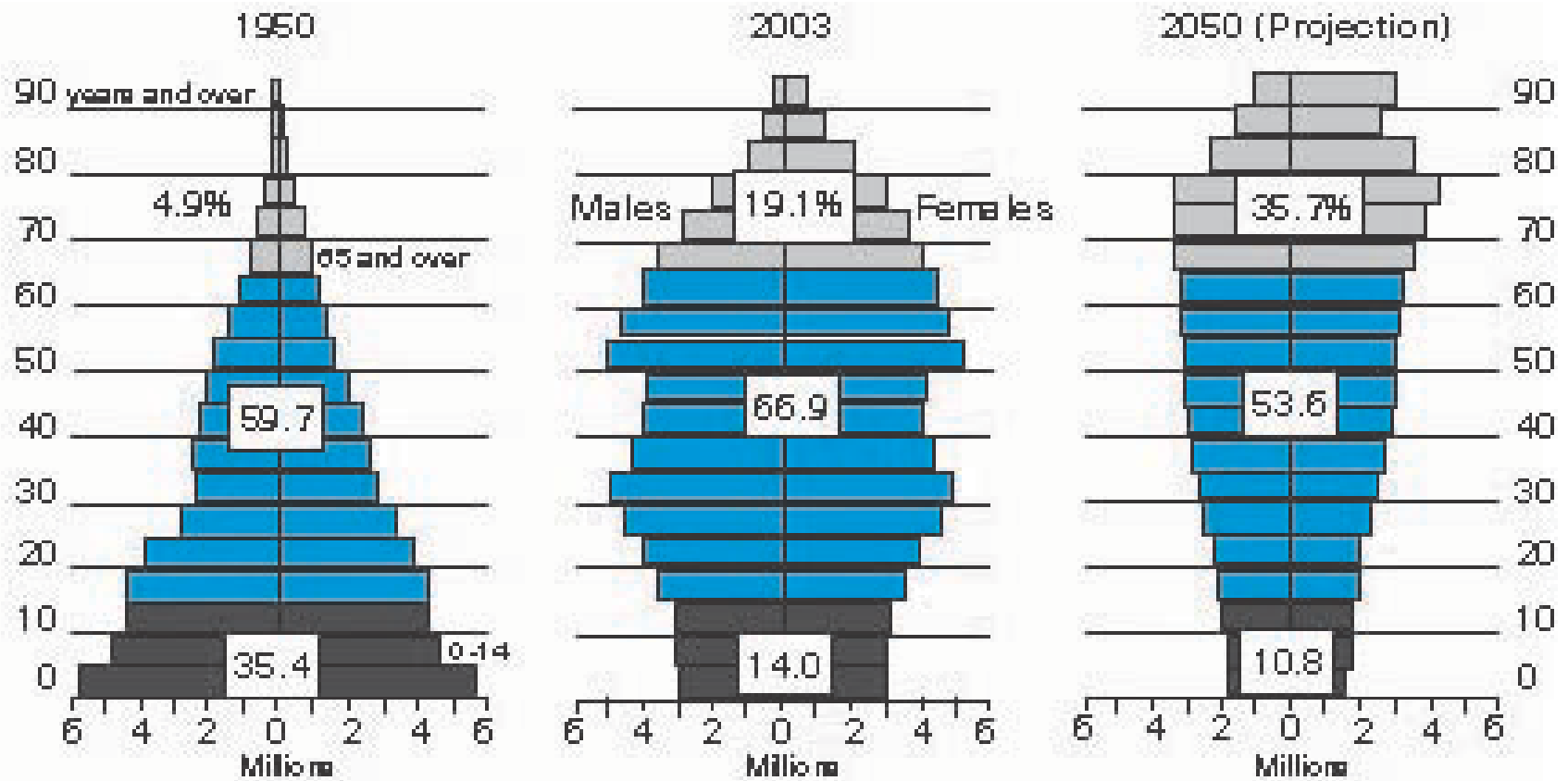


# Progress as Growth AND Sustainability

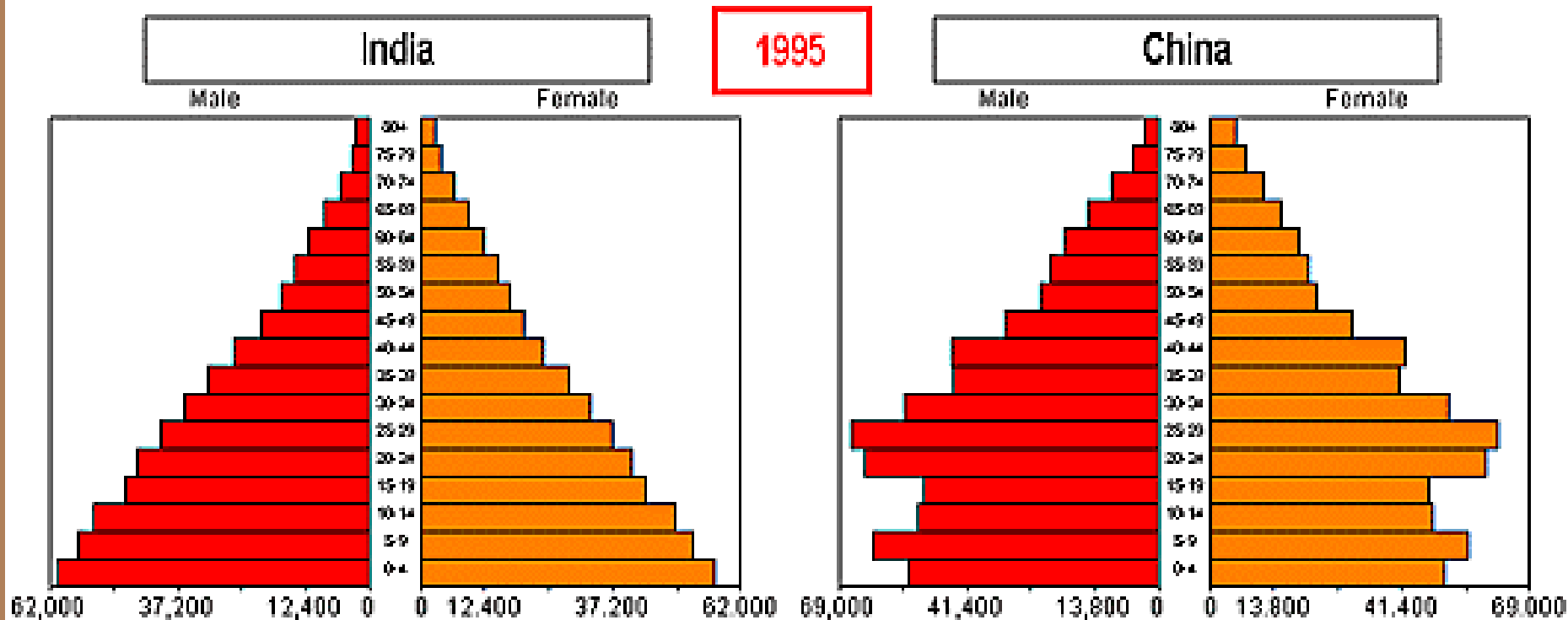
- **Growth in Defining Success:**
  - Feeding a Growing Population
  - Population Growth
  - Managing Water
  - Technology
- **Sustainability**
  - Controlling Populations
  - Rising Expectations and Consumption
  - Inverted Population Pyramids and Aging Societies
  - The Environment



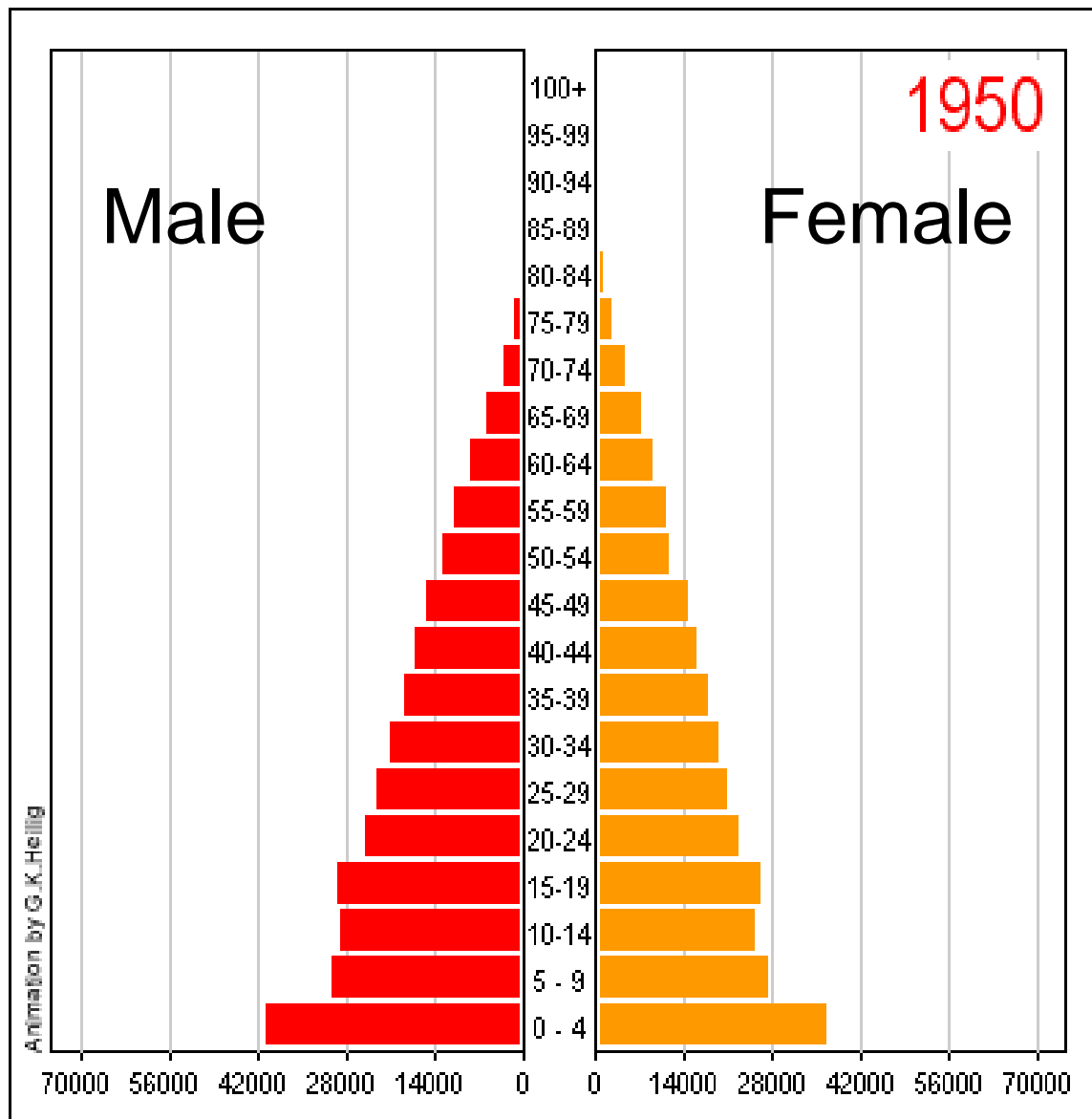
# Population Pyramids in Japan 1950, 2003, 2050



# Indian and Chinese Population Pyramids, 1995



# Chinese Population, 1950-2050





# Managing Water in China

- Flood and Drought
  - Water Control in Traditional China
  - Water Control today (Three Gorges Dam...)
  - Desertification in China Today
- Water Transfers from South to North
- Rising Water Consumption in:
  - Agriculture
  - Industry
  - Domestic

**With its monsoon climate, China experiences “Katrinas” on a regular basis.**



# Growing Chinese Demand for Water From 2000 to 2010

- Urban China: from 50 to 80 billion cm
- Industrial China: from 127 to 206 billion cm
- Waste in irrigation (80% evaporation)
- Beijing's falling water tables: 200 feet since 1965.



# Water and Economic Growth

“Some economic booms grind to a halt, others run out of steam, but in China the biggest risk is that growth will dry up. Water, the country’s scarcest resource, is running out. Pollution, waste and over-exploitation have combined with the expansion of mega-cities to foul up wells and suck rivers dry.”

-The Guardian, October 9, 2006

# Chinese Character for Government: Controlling Water-Feeding People

水 = water      治 → 口 = mouth  
zhi

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- govern, rule, control
- administer, manage

# Montana and Rising Asia:

“China is where the action is.....China has 250 cities with a population of a million or more.”

--Arnold Sherman, World Trade Center, UM

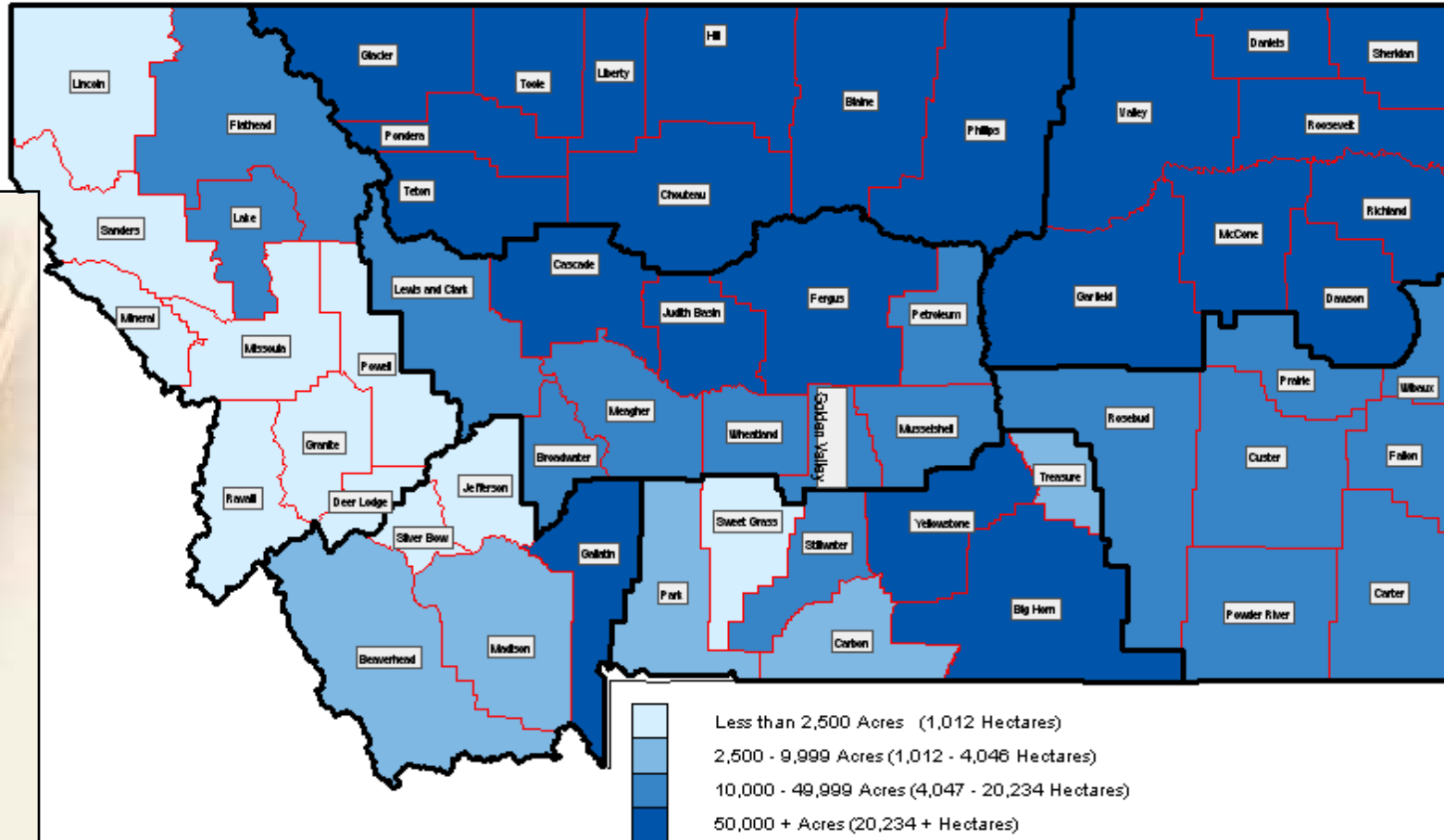
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## **Wheat and Beef—yes—but if only:**

- Cargill moved from Minneapolis to Billings
- Boeing moved from Seattle to Helena
- MacDonaldis moved from Oak Brook to Missoula
- Your favorite...

# All Wheat-2005

## Harvested Acres (Hectares)





# Wheat

Spring  
Wheat



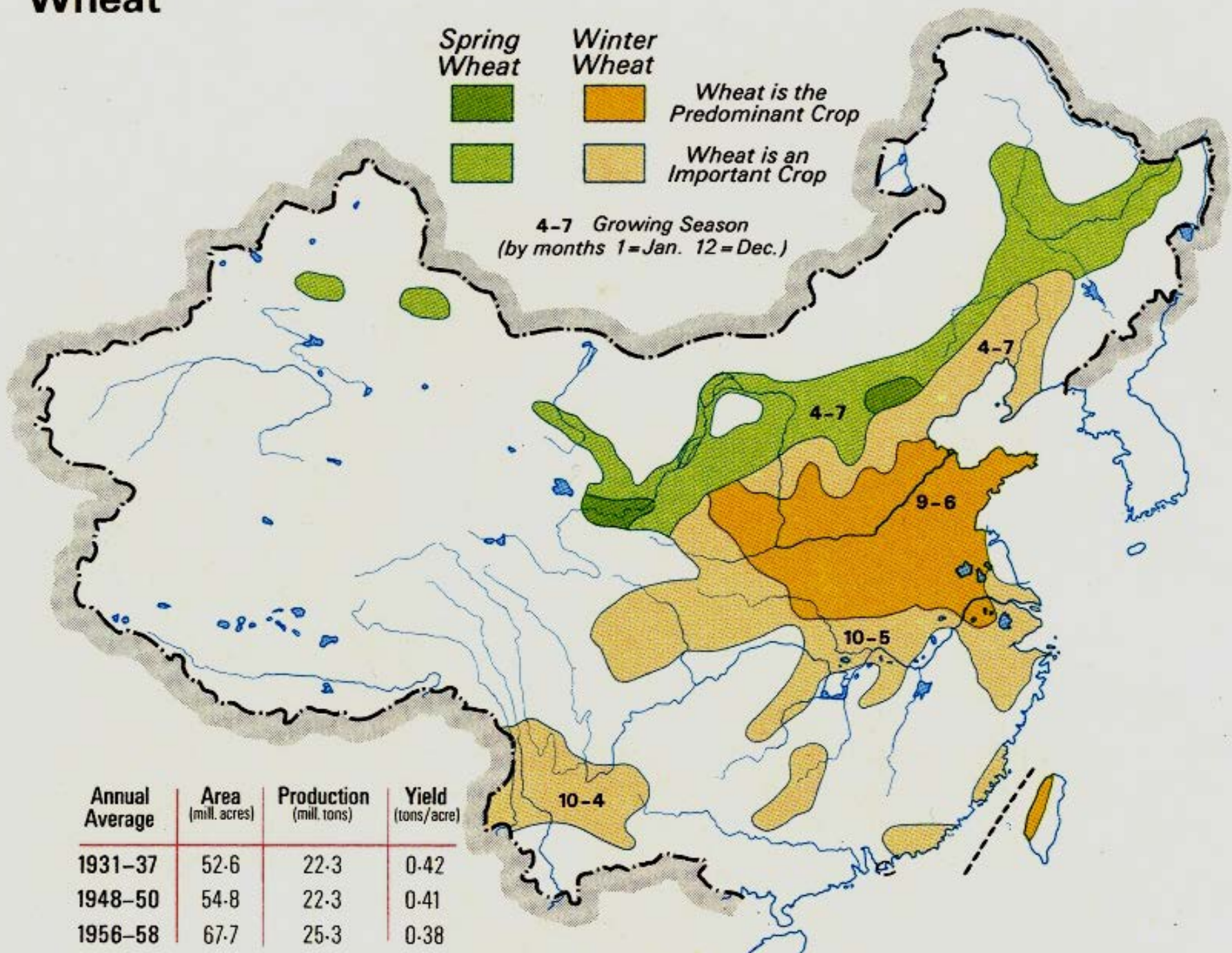
Winter  
Wheat



Wheat is the  
Predominant Crop

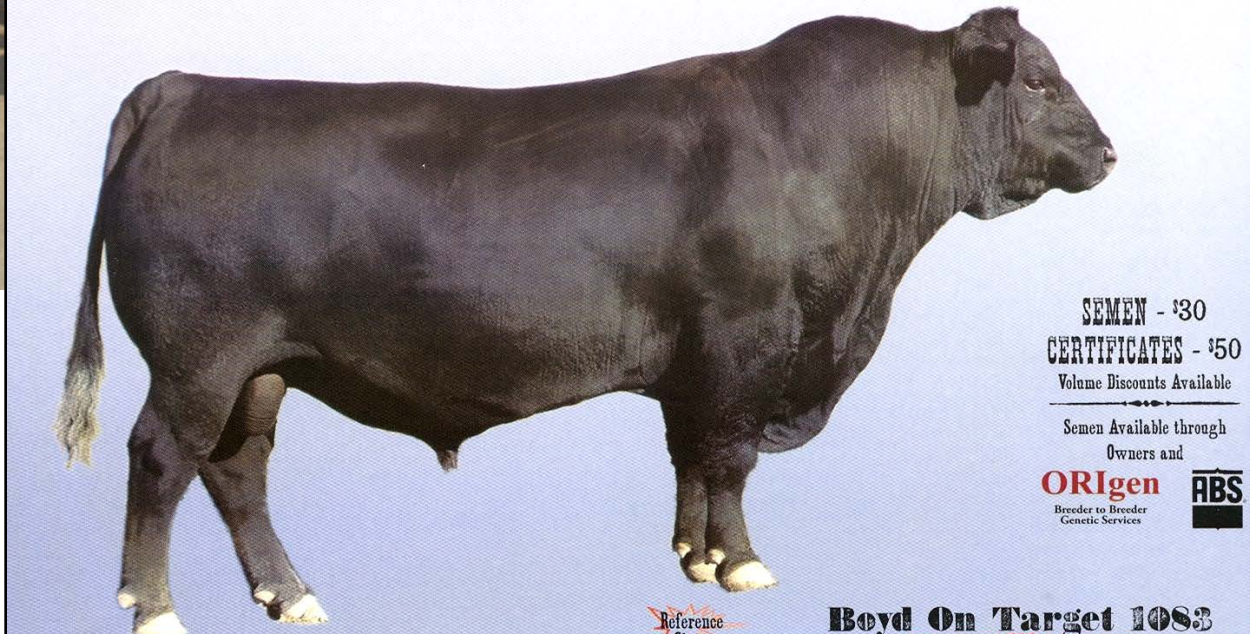
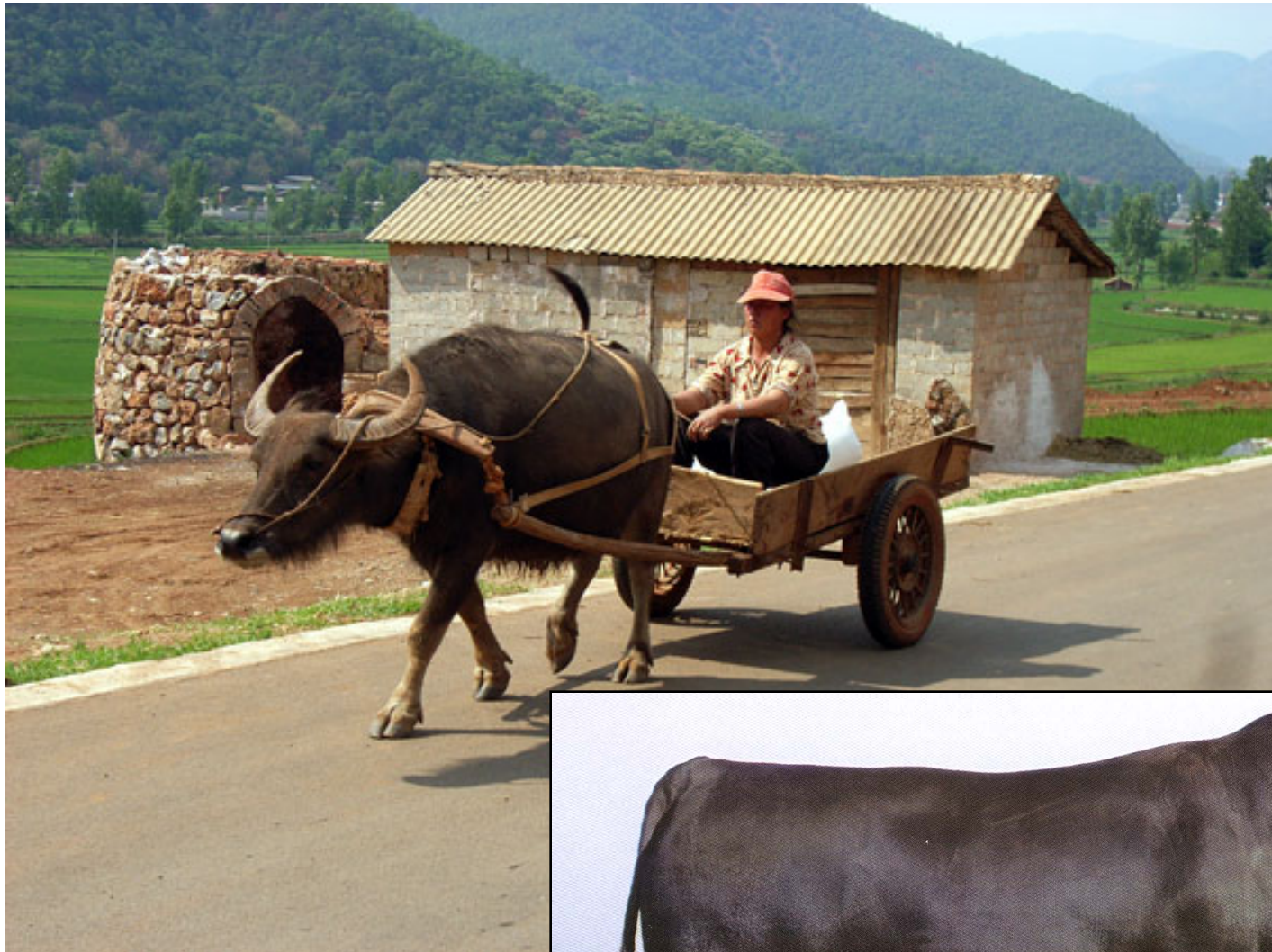
Wheat is an  
Important Crop

4-7 Growing Season  
(by months 1=Jan. 12=Dec.)



Annual Average	Area (mill. acres)	Production (mill. tons)	Yield (tons/acre)
1931-37	52.6	22.3	0.42
1948-50	54.8	22.3	0.41
1956-58	67.7	25.3	0.38





SEMEN - \$30  
CERTIFICATES - \$50  
Volume Discounts Available

Semen Available through  
Owners and

**ORigen**  
Breeder to Breeder  
Genetic Services

**ABS**

Reference  
Genetics

**Boyd On Target 1083**





Wangfujing Street, a popular tourist attraction, in Beijing.

# Montana Beef and China

“In 2003, China was one of our top ten markets importing nearly 26.5 million pounds of U.S. beef and beef products valued at over \$28 million. No other place on earth holds the potential that China does for our business. The Montana beef industry is at a pivotal point to negotiate a trade agreement that is favorable to U.S. beef.”

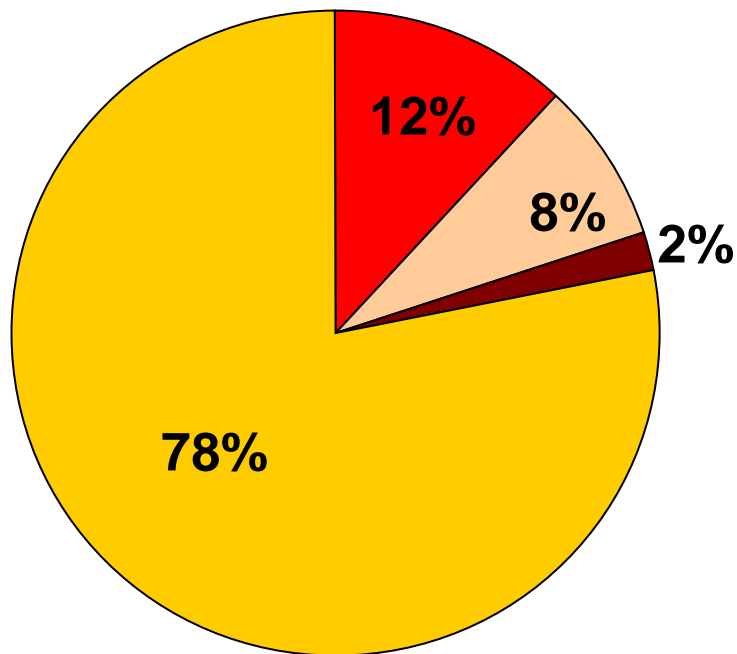
(National Cattlemen's Beef Association, December 2006)

((High Plains/Midwest , December 27, 2006)



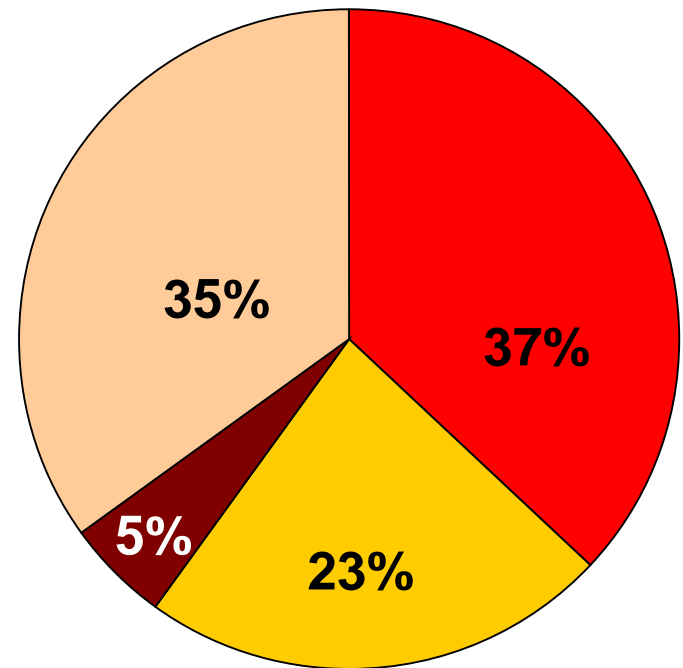
# Average Daily Diet, Calories

Peoples Republic of China



- Other\*
- Meat, eggs, fish and milk
- Vegetables and fruits
- Cereal, potatoes and other starchy foods

United States



\*Includes fats, oils, pulses, nuts, seeds, sugar and other sweets.

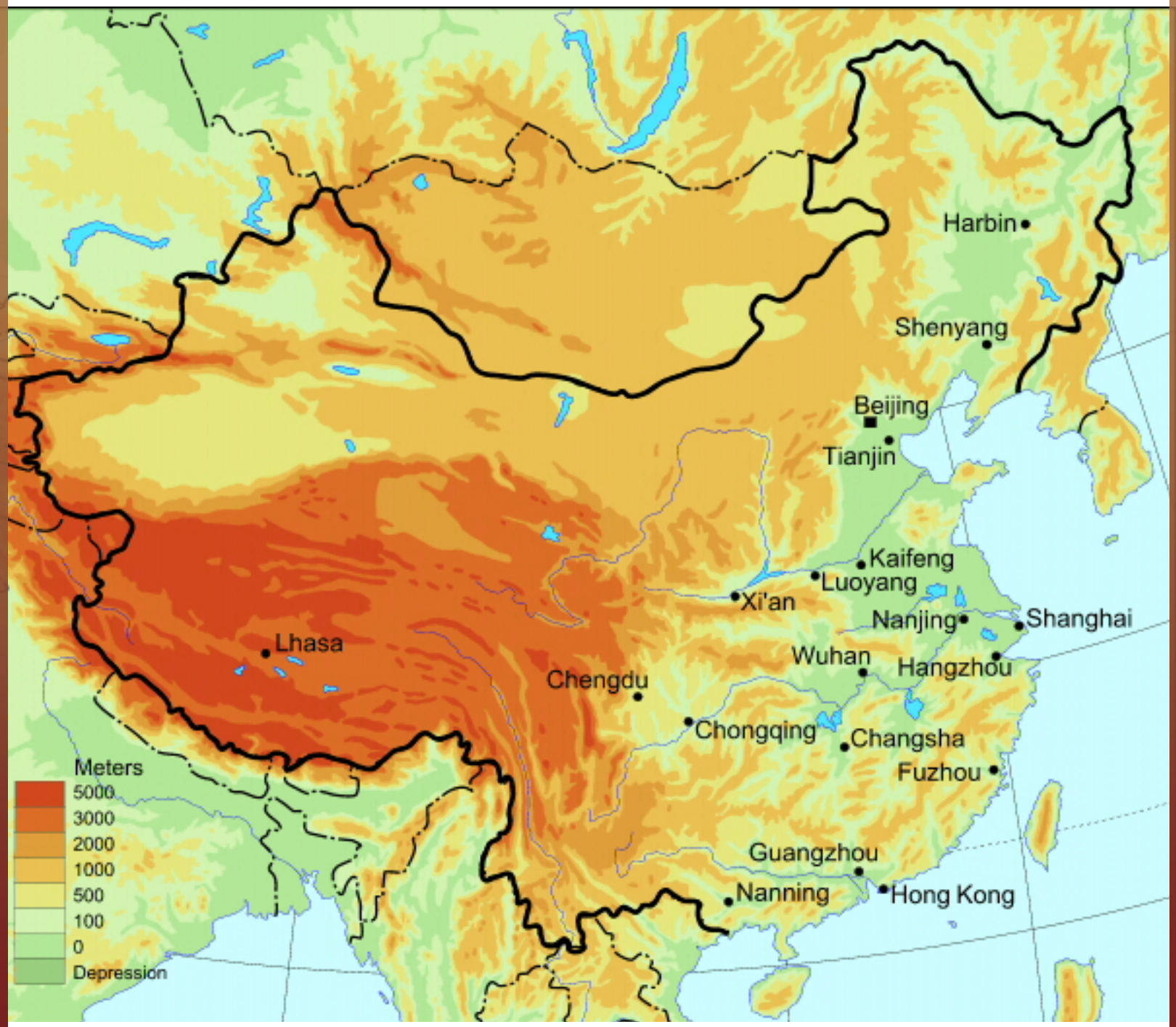
# Becoming Closer Neighbors

- Asian Producers and the Box Store Economy
- Asian Consumers and Montana Exports
- Exchange Programs and Tourism
- Asia in Montana Classrooms
  - Chinese/Japanese Language and full East Asia courses at UM and MSU, Carroll College
  - Seminar on East Asia for Montana School Teachers
  - Asian units and themes in other college teaching
  - Asia and world history in the public schools
- The Mansfield Legacy: “We are going to have to understand each other better.”

# QUESTIONS?

**Recommended Reading:**

**Peter Hessler, Oracle Bones**





**Massive wall sweeping over crested mountains of North China.**



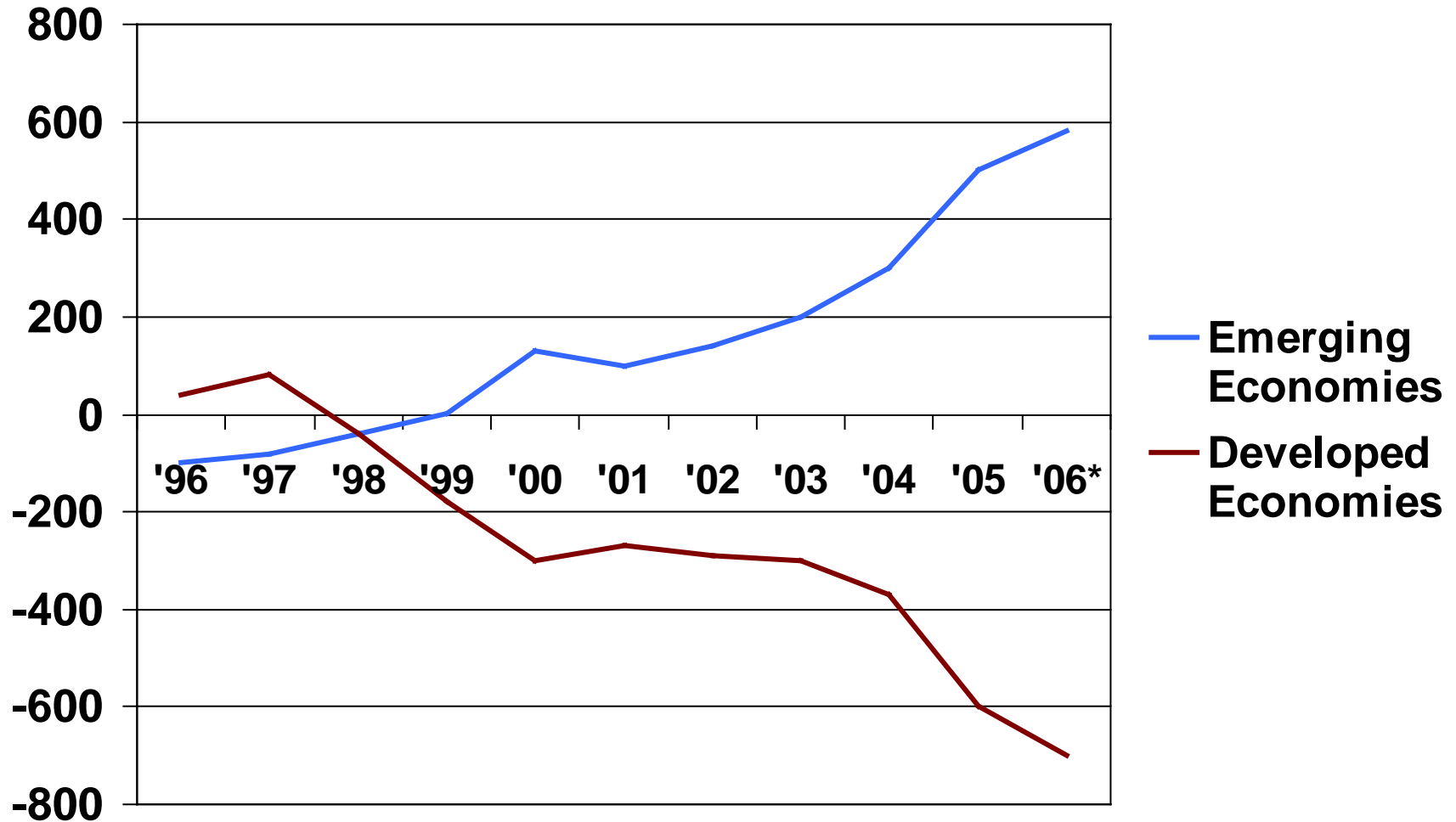


# 1800: World's Eight Largest Cities

● Beijing (Ch)	1,100,000
● London	861,000
● Canton (Ch)	800,000
● Tokyo (Edo)	685,000
● Istanbul	570,000
● Paris	547,000
● Naples	430,000
● Hangzhou (Ch)	377,000
● [Philadelphia]	50,000

# Buddy Can You Spare \$600 Billion?

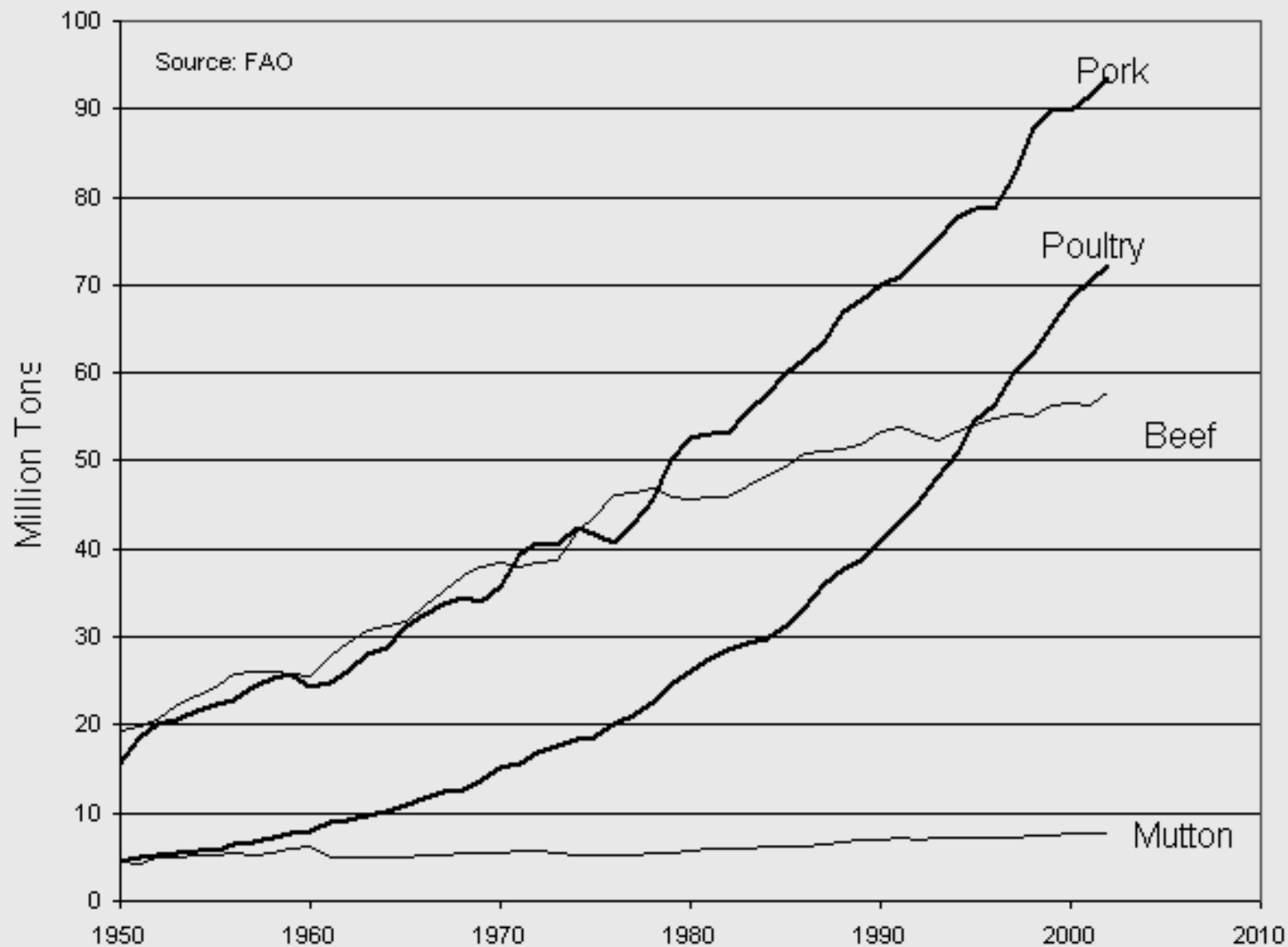
## Current Account Balances



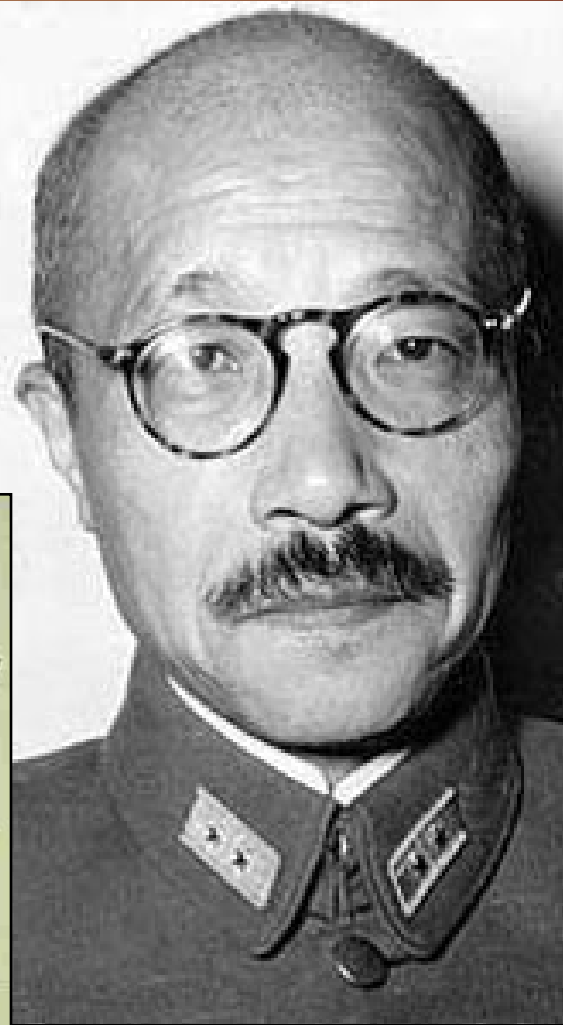
Note: \*Forecast.

Sources: International Monetary Fund; *The Economist*.

Figure 8-1. World Meat Production by Type, 1950-2002



# World War II Poster



Tojo  
Hideki

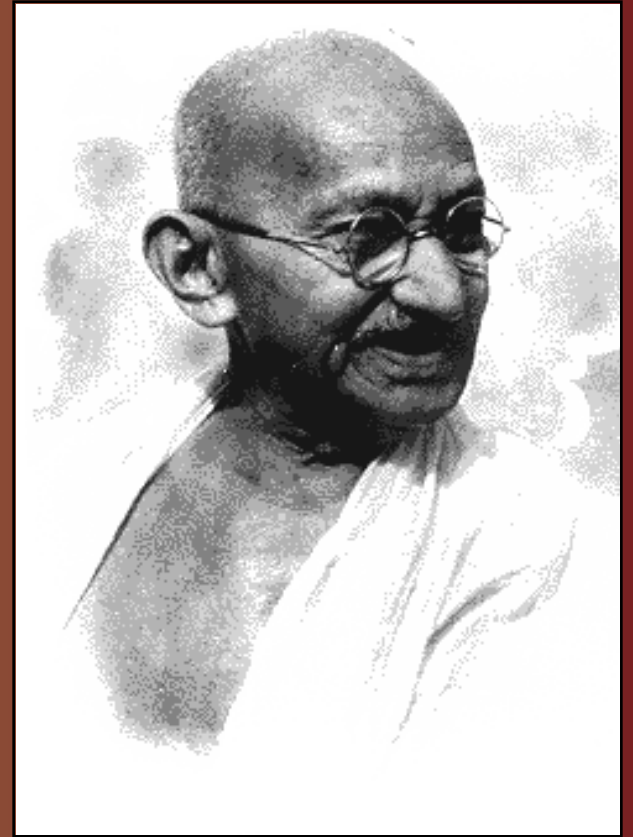
Iwo Jima







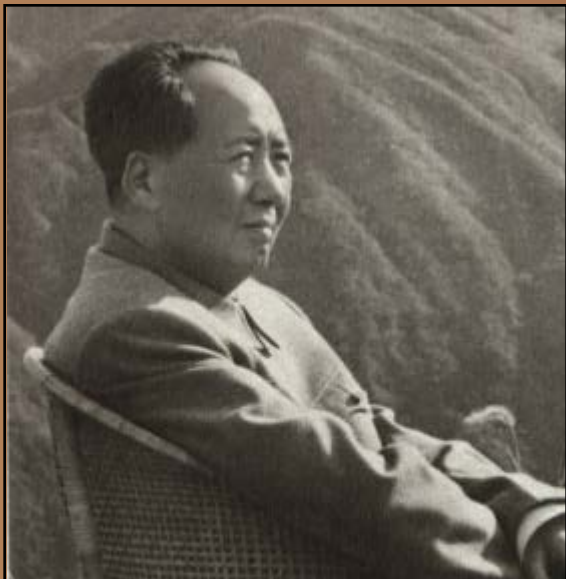
**Ho  
Chi-minh**



**Gandhi**



**Kim  
Jong-il**



Maybe That's Why They're Called 'Reds'!



NEA Service, Inc.







**Tenggeli Desert, Inner Mongolia.**



# ON TARGET

For the Beef Industry's Demand, Today and Tomorrow



SEMEN - \$30

CERTIFICATES - \$50

Volume Discounts Available

Semen Available through  
Owners and

**ORigen**

Breeder to Breeder  
Genetic Services



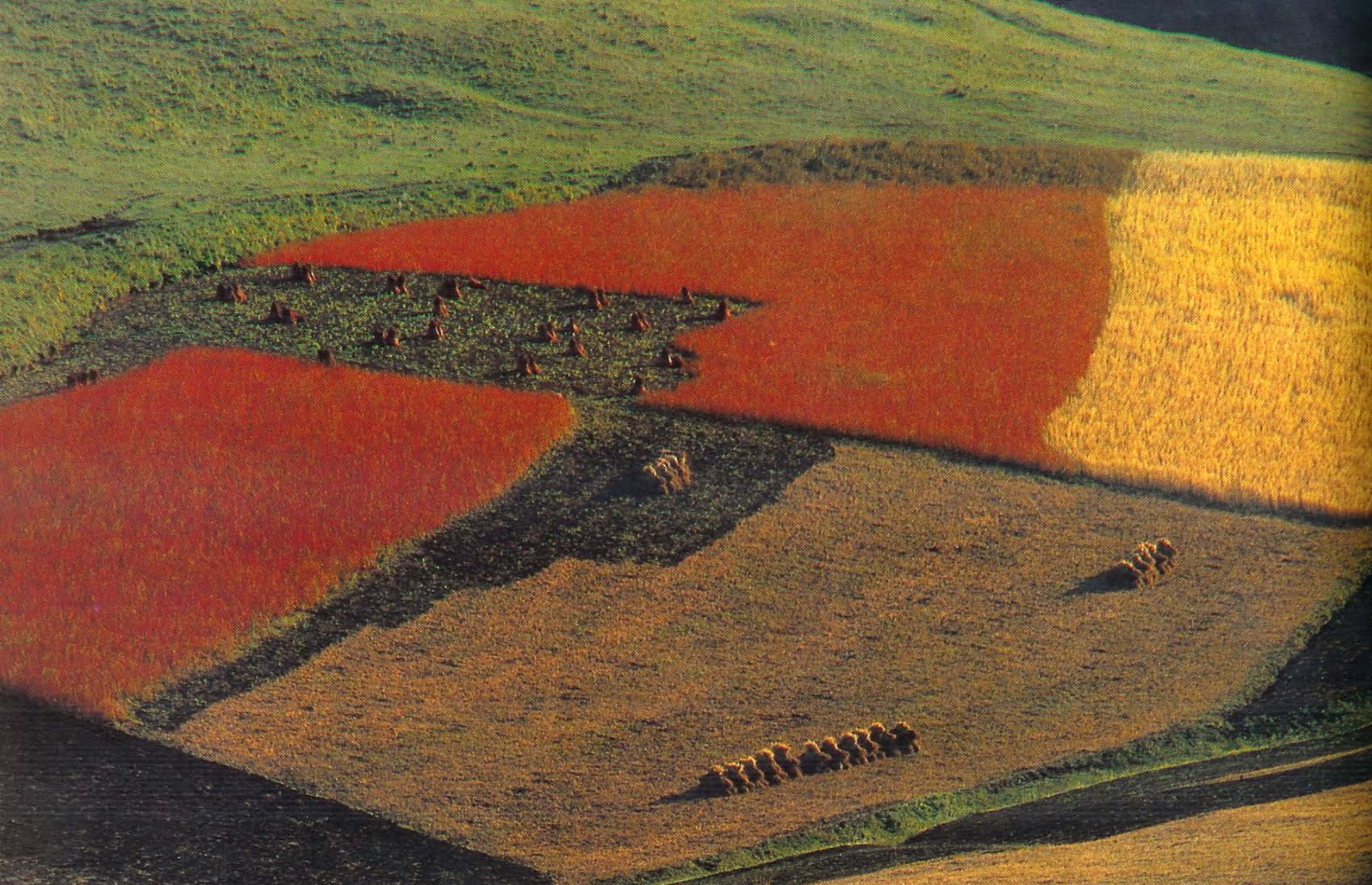
Reference  
Sire

**Boyd On Target 1083**

# Montana Wheat

- 153 m bushels/year
- 4<sup>th</sup> state in US wheat production
- 80% of American wheat export is to Asia
- Top agricultural revenue source  
(\$355 m in 2004)





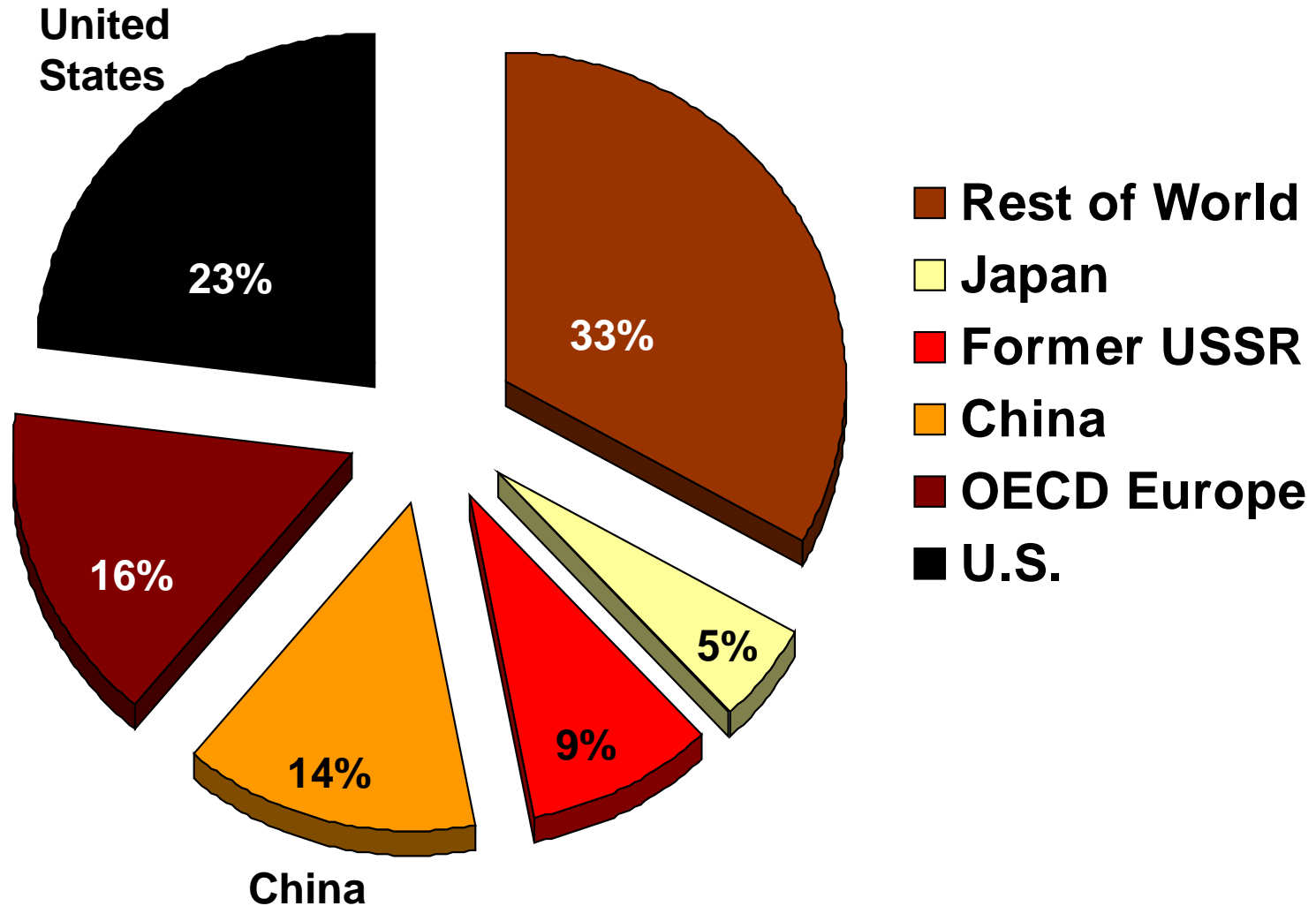
Autumn in mountainous area near Ningxia, ripe wheat (yellow) and buckwheat (red).

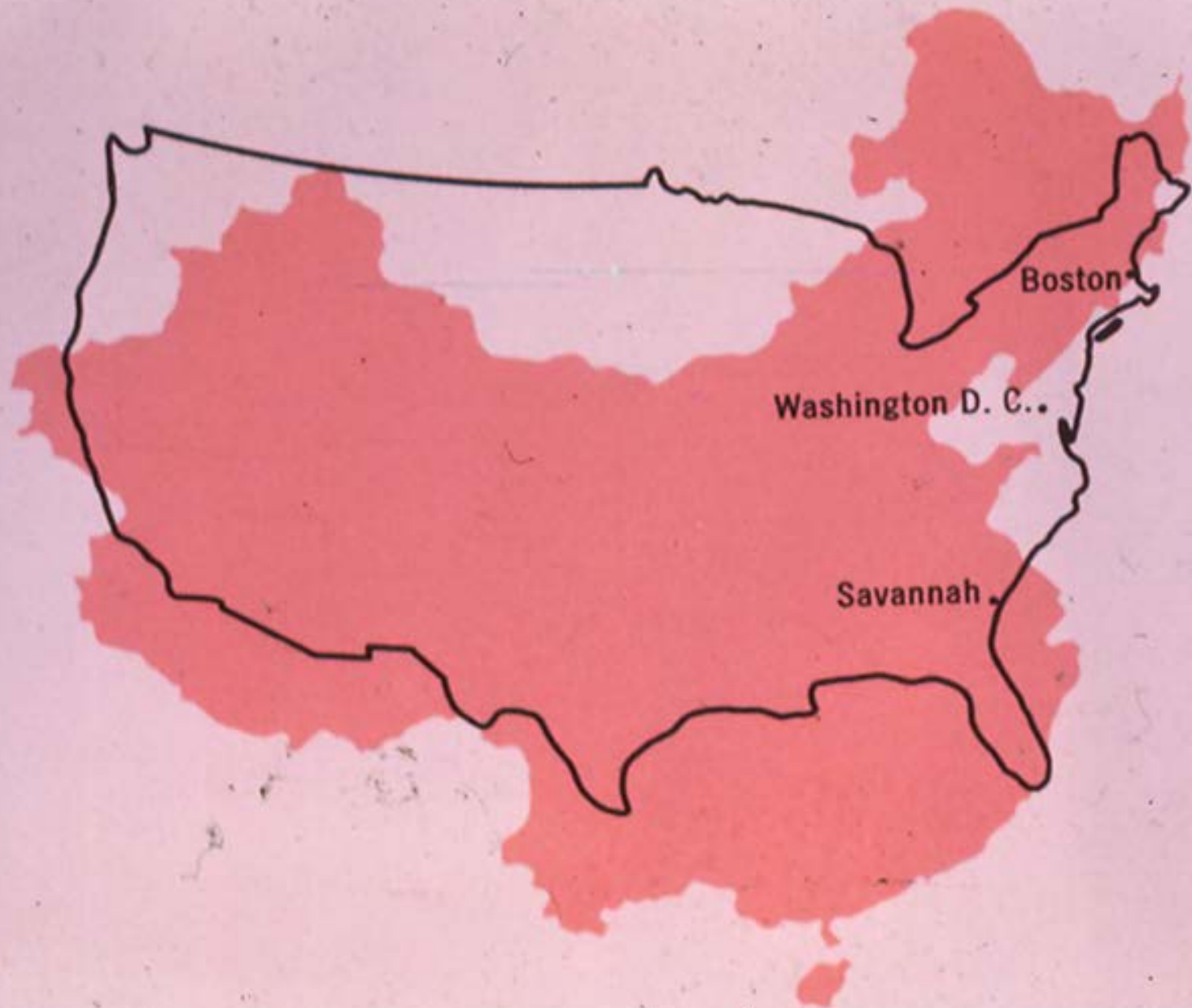


# Montana Beef

- Beef: 45% of agricultural marketing
- Decrease in beef production since 1970
- Montana's calf-cow production dominates
- Niche markets: grass fed beef; stock, embryos, semen
- Mad Cow Disease

# Global Energy-Related CO2 Emissions, 2002





Boston

Washington D. C..

Savannah

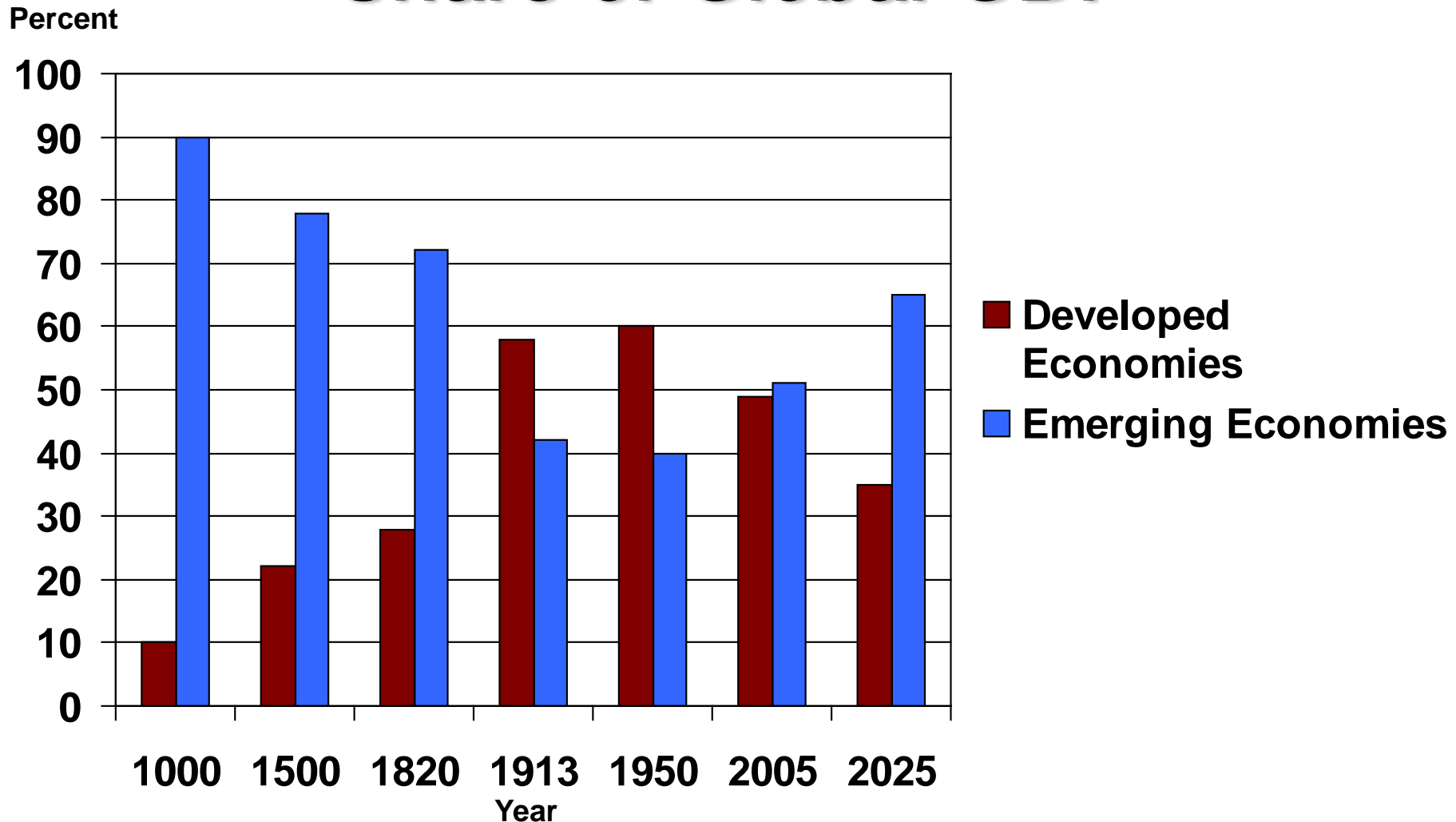






# Emerging Economies in World History

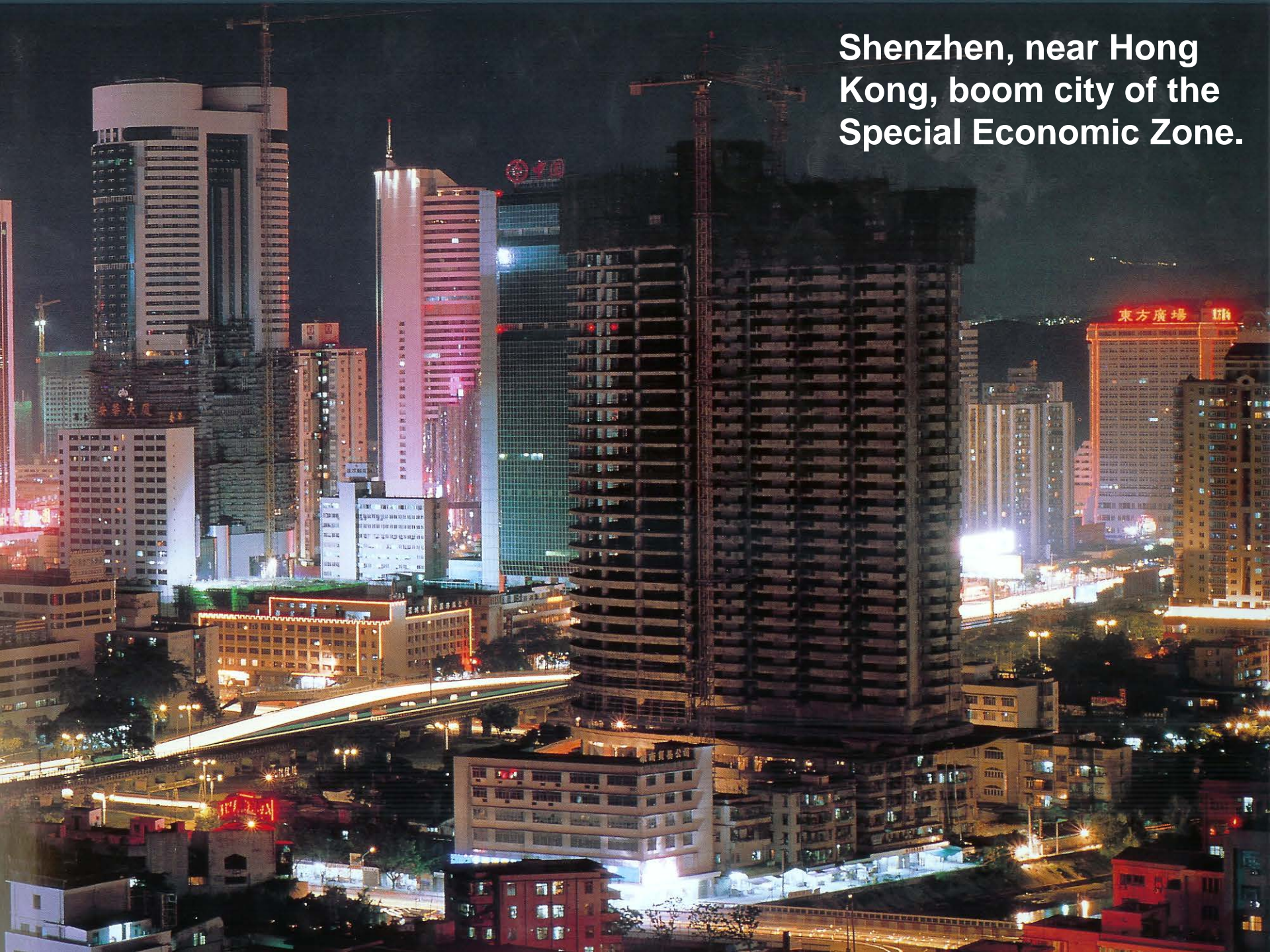
## Share of Global GDP



Sources: Organisation for Economic Co-operation and Development, Angus Maddison; International Monetary Fund; *The Economist*.



**Shenzhen, near Hong Kong, boom city of the Special Economic Zone.**







**Cool modernization  
in rural China.**