

What the Depreciation of the Dollar Means for Washington Exporters

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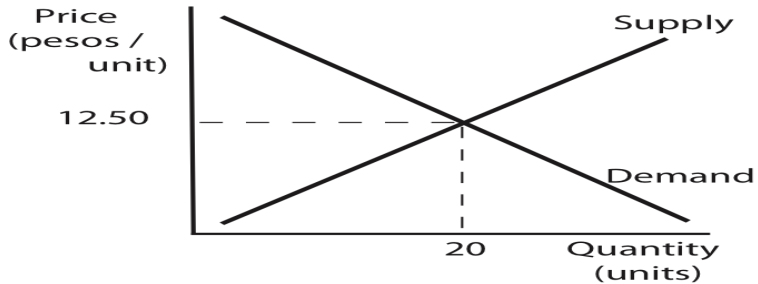


Introduction to Currency Exchange

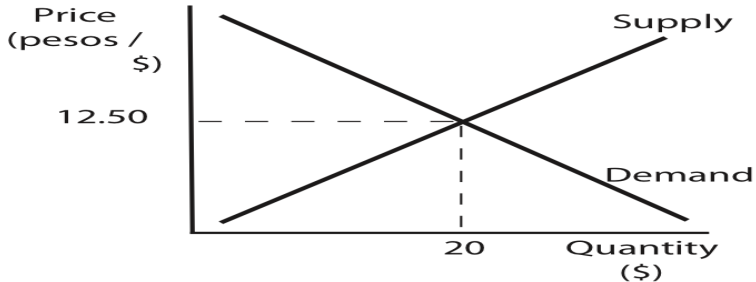
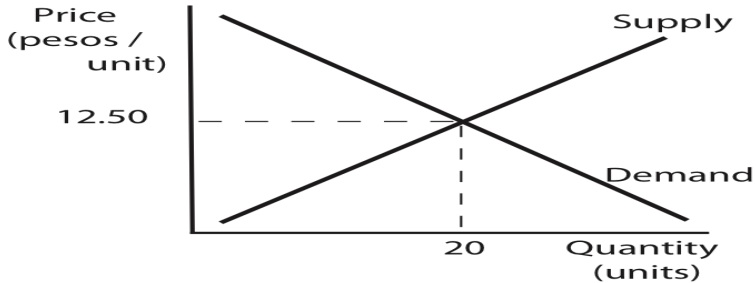
- ▶ Purchases of foreign goods and assets involves two trades
 - Buy foreign good or asset with foreign currency:
Foreign goods market
 - Buy foreign currency with domestic currency:
Exchange rate market
- ▶ *Effective* price can change in two places instead of one
- ▶ Theory of exchange rates & international trade
- ▶ Data on recent exchange rate trends
- ▶ What does this mean for WA and U.S. trade?



Market for Goods



Market for Foreign Currency

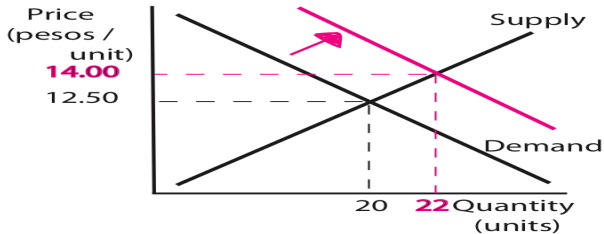


Understanding Exchange Rates

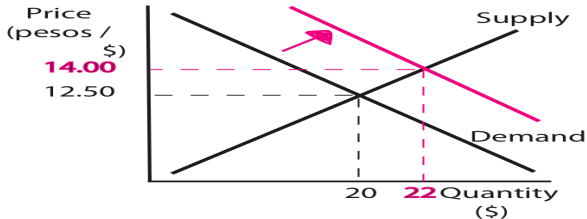
- ▶ Foreign exchange markets are anti-symmetric:
10 pesos for \$1 is the same as 1 peso for \$0.10
- ▶ Historically foreign exchange prices are **in terms of \$1**
 - U.S.–Mexico exchange rate is 12.5 pesos
 - U.S.–Japanese exchange rate is 120 yen
 - British pounds are the exception, \$ per 1 £
 - No consistent format for euro
- ▶ Very easy to get confused



Foreign Currency Price Changes



Takes more pesos to buy one unit: price increase or each peso buys less units



Takes more pesos to buy one \$: price increase or each peso buys less dollars



Appreciation vs. Depreciation

- ▶ **Appreciation** is when each unit of domestic currency buys **more** foreign currency than before
 - This means price of foreign currency **decreases**
 - Strong currency
- ▶ **Depreciation** is when each unit of domestic currency buys **less** foreign currency than before
 - This means price of foreign currency **increases**
 - Weak currency
- ▶ Widespread belief that currency “strength” associated with nationalism
- ▶ In reality, exchange rate changes help some Americans & hurt others



An Example

- ▶ A cheeseburger costs 100 pesos in Mexico. Exchange rate is 10 pesos. It costs \$10 for an imported cheeseburger (No transportation costs, taxes, or fees)
- ▶ Now cheeseburger still costs 100 pesos But exchange rate = 20 pesos.
- ▶ What is U.S. price to import a cheeseburger now? **\$5**
Has the peso appreciated? **No, depreciated**
Has the dollar appreciated? **Yes**
- ▶ Conversely, if a hotdog cost \$8 in the U.S., Mexicans used to pay 80 pesos, but now they pay 160 pesos!

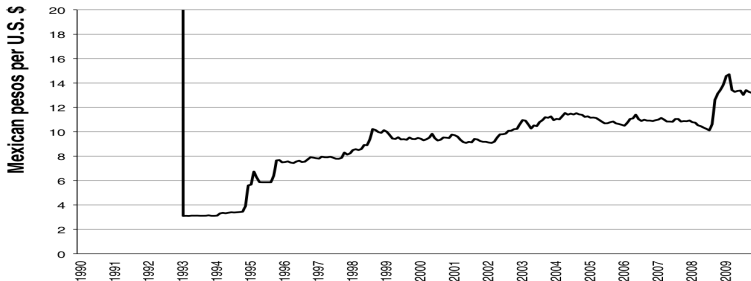


Exchange Rates and International Trade

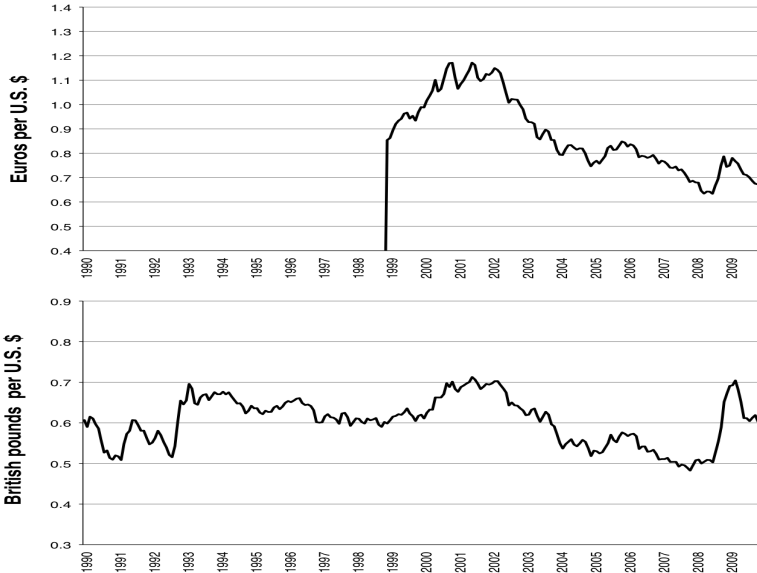
- ▶ When domestic currency **appreciates** then
 - Imports become **cheaper** for domestic buyers
 - Exports become **more expensive** to foreign buyers
 - Who benefits? U.S. cheeseburger eaters (whether they import or not), Mexican exporters
 - Who loses? U.S. cheeseburger makers, Mexican importers
- ▶ When domestic currency **depreciates** then
 - Imports become more expensive for domestic buyers
 - Exports become cheaper to foreign buyers
- ▶ Absolute exchange rate does **not** matter
Only the **change** in exchange rate matters



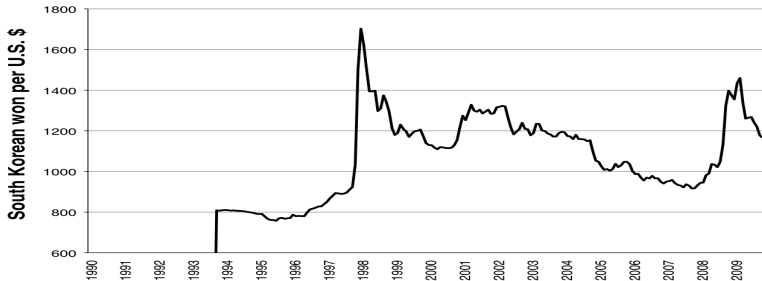
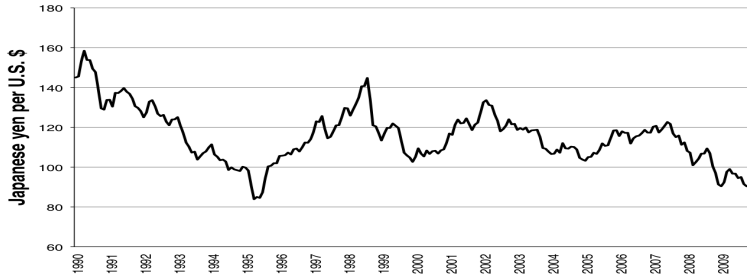
Exchange Rate Trends: North America



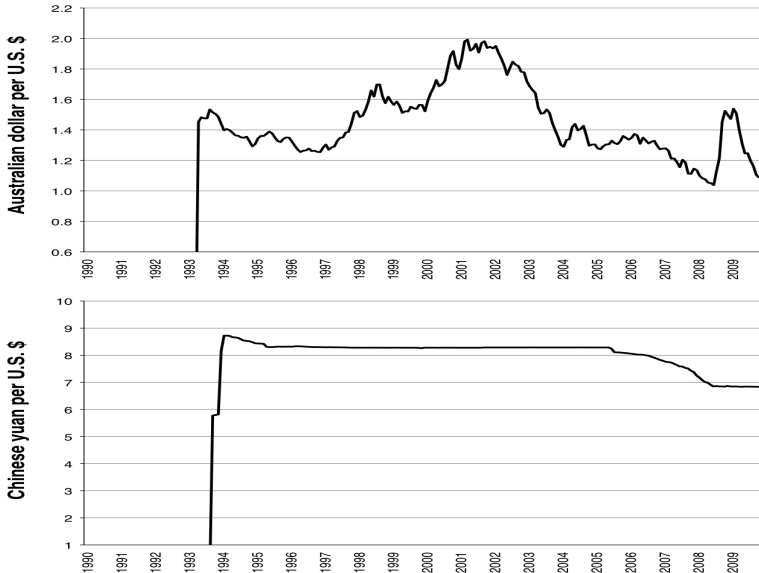
Exchange Rate Trends: Europe



Exchange Rate Trends: East Asia



Exchange Rate Trends: Australia & China



Implications for Exporters

- ▶ After 10 years of a strong currency (favoring importers, consumers), dollar is in a weakening trend benefiting U.S. firms
- ▶ Why? - Beyond scope of this introduction
- ▶ Will it last? - Nobody knows (but people paid to predict)
- ▶ 2008 appreciation due to worldwide recession
Investors sold domestic assets to buy U.S. debt (bonds) requiring dollars



Complications

- ▶ Spot vs. forward exchange rates
 - Spot rate is the price you pay in this instant of time
 - Risk that future exchange rates more costly than now
You can buy a contract for a future date or insurance
 - Long-term contracts slow down depreciation process
- ▶ Nominal vs. real exchange rates
 - Previous data was nominal, price in money
 - Real data accounts for inflation, price in value
 - $$\underset{\text{pesos per \$}}{\text{Real XR}} = \underset{\text{pesos per \$}}{\text{XR}} \times (CPI_{US}/CPI_{Mex})$$
 - Real exchange rate \$ depreciation much less
Thus benefits to U.S. firms less



Floating vs. Fixed Exchange Rates

- ▶ Floating: market decides price
Most currencies
- ▶ Fixed: government manipulates market to keep Xrate constant
China pre-2005, mostly post-2005
 - Monetary policy:
Gov reduces interest rates (inflationary) so people don't want currency for saving
 - Foreign exchange controls:
Gov limits private exchange transactions
 - Exchange market intervention:
Gov buys dollars (and removes them from circulation) until price is reached



Conclusion

- ▶ Foreign exchange markets work **just** like goods markets
- ▶ Necessary to buy foreign goods and assets
- ▶ Effective price can change with value of good or foreign currency
- ▶ Depreciation is good for domestic firms (exporters) and foreign buyers (importers)
- ▶ Strong \$ for ten years (and massive US imports)
- ▶ Recent depreciation except for Mexico & China
- ▶ Theory predicts U.S. exports increase, but complication slow process down

