

FCVs and Hydrogen in California

Preparing for market launch



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May 2012

Progress to date



- ▶ ~200 FCVs&FCBs on road today
- ▶ >4 million road miles
- ▶ 6 public H₂ stations
- ▶ 2 public stations open soon
- ▶ 11 new/upgrade stations in development
- ▶ California is on track to have approx. 20 public H₂ stations by end of 2013
 - And another 9+ in funding process now



Crossing the Bridge



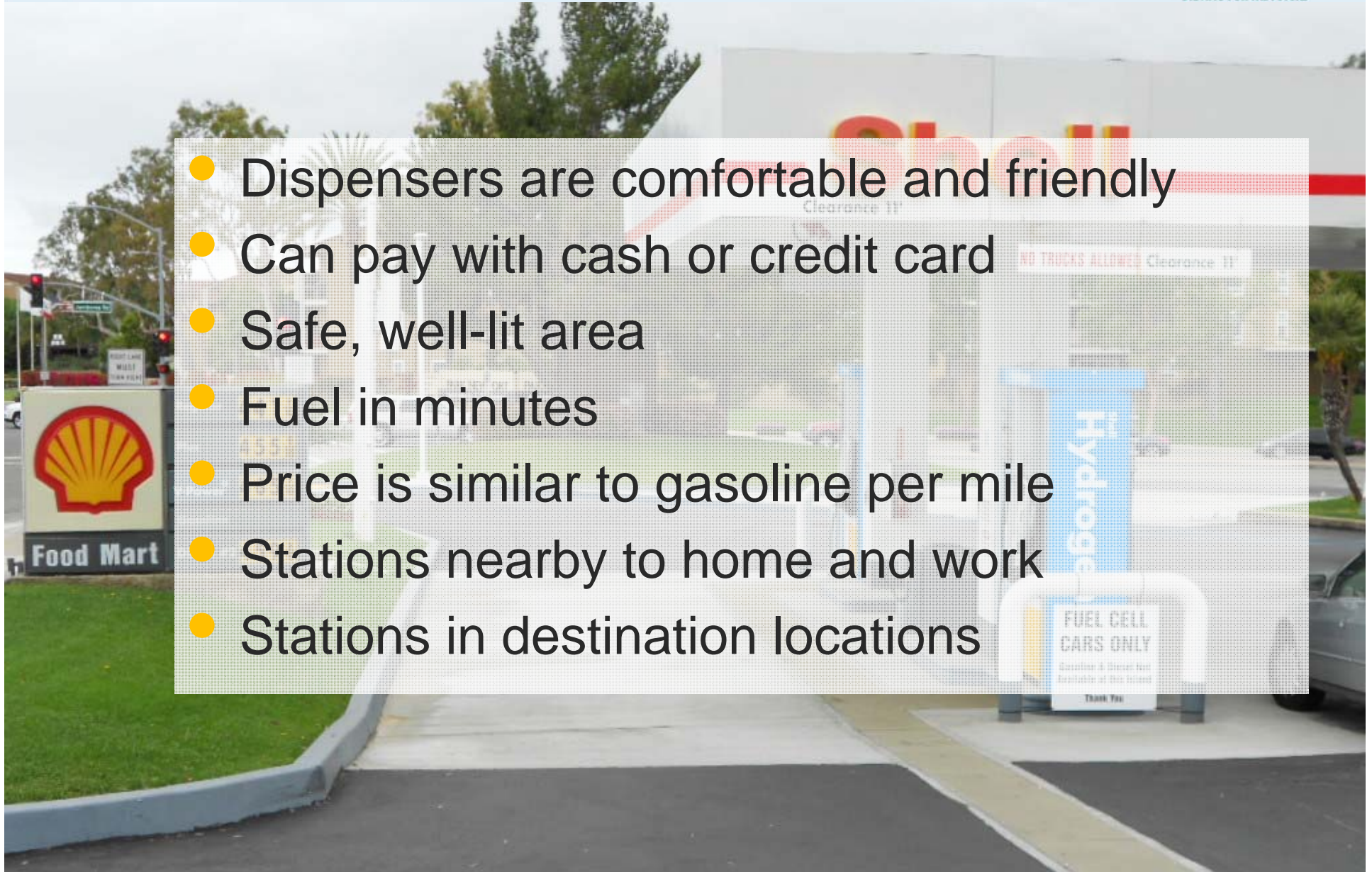
A fuel cell vehicle is electric!



Fueling opportunities



- Dispensers are comfortable and friendly
- Can pay with cash or credit card
- Safe, well-lit area
- Fuel in minutes
- Price is similar to gasoline per mile
- Stations nearby to home and work
- Stations in destination locations



Access to stations

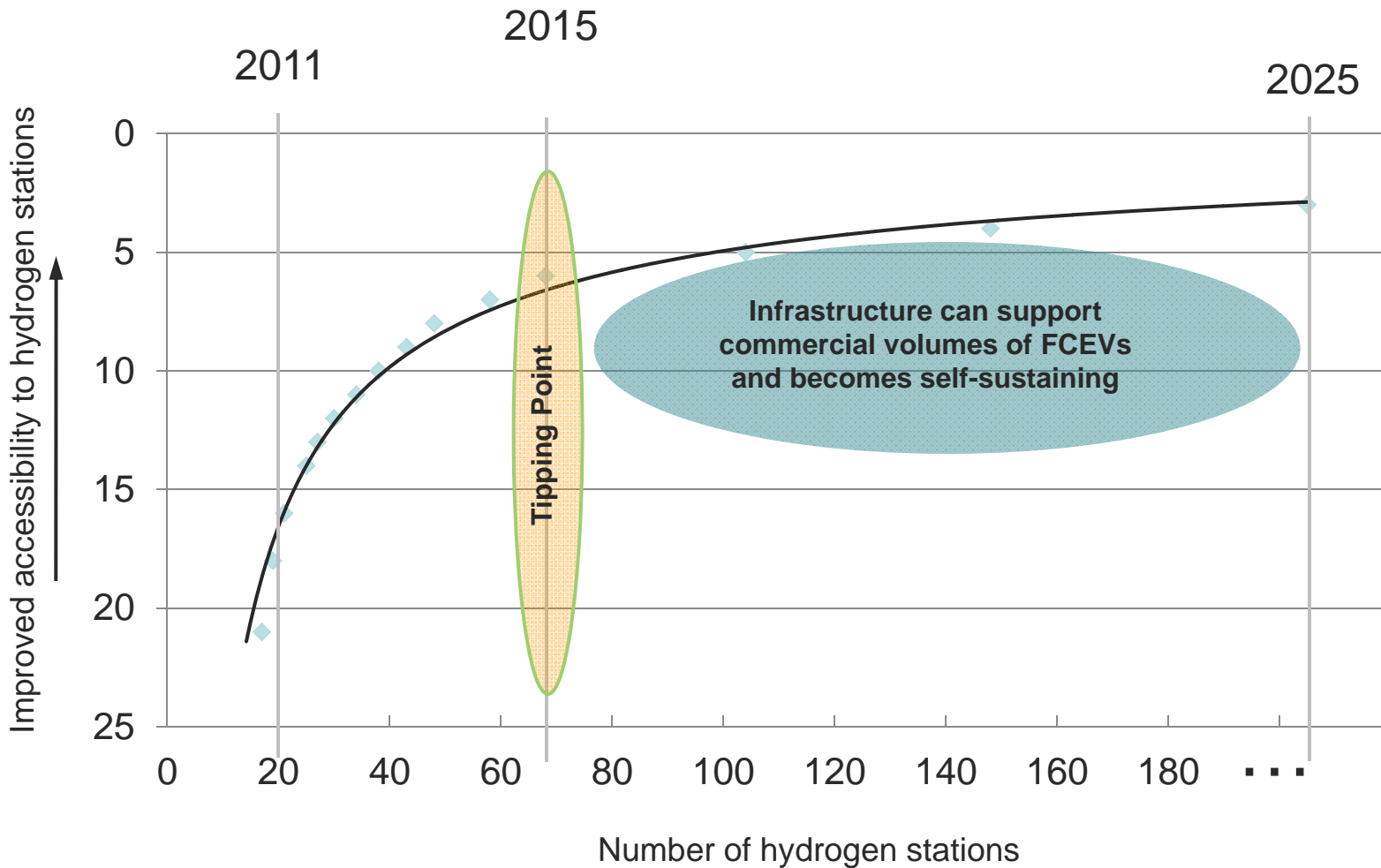


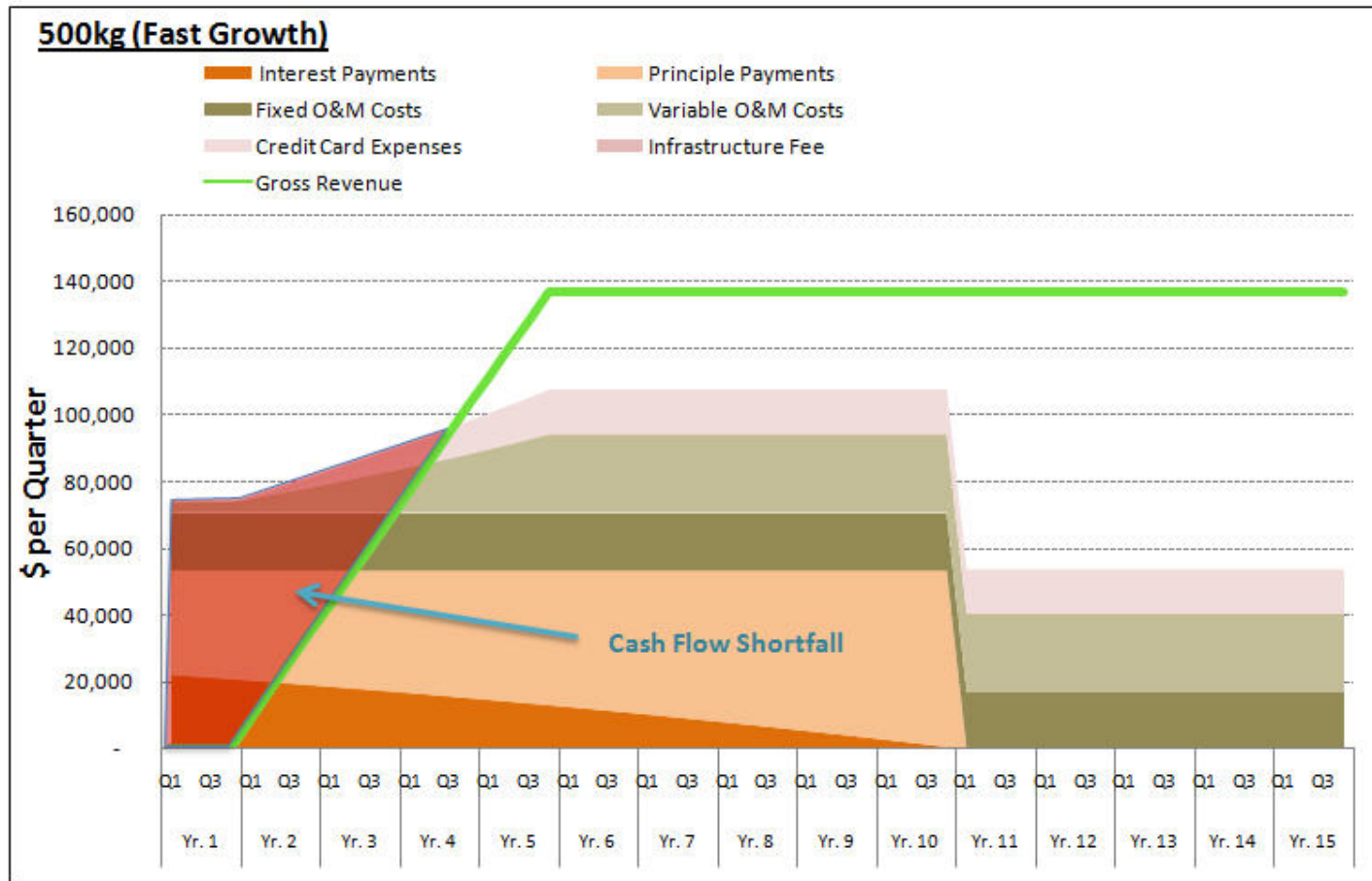
Chart courtesy of National Fuel Cell Research Center at UC Irvine

What is the “right” number?



- ▶ OEMs identified need for 68 stations by 2015
 - 46 stations in five urban clusters in California
 - 22 stations to seed new clusters and build the statewide network
- ▶ 37 stations already in process or expected to be funded
- ▶ 31 more stations needed by 2015
 - Additional funding needed

Supporting early stations



Source: Energy Independence Now

Key Assumptions: 100% Debt Financed, \$1.5M, 500 kg/day capacity station, \$3 retail margin, up to 100% capacity utilized, Fast Growth (cluster station) →\$670K Shortfall

The “right” number provides...



▶ Coverage

- Fueling opportunities

▶ Confidence

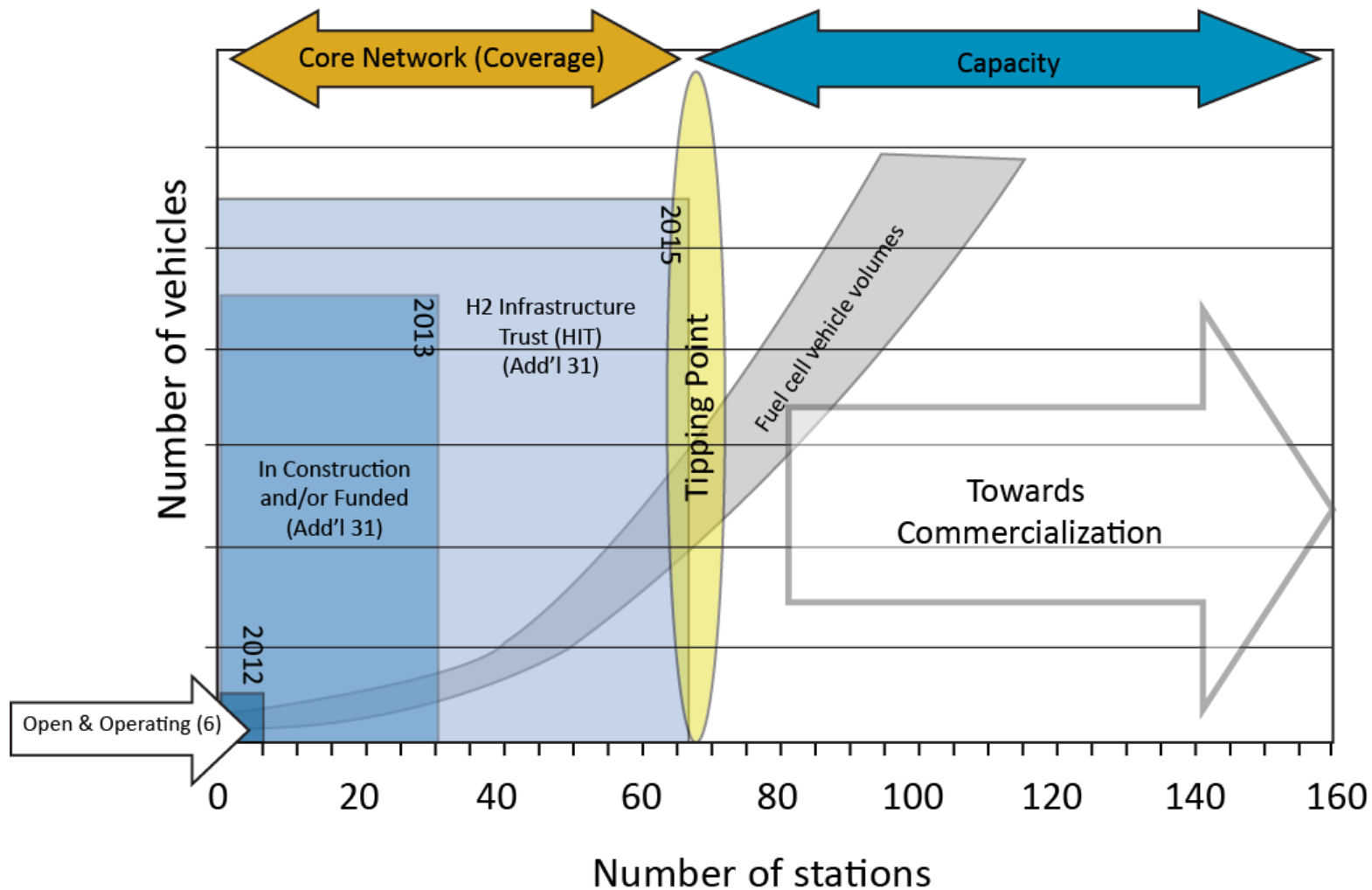
- Automakers build volume
- Customers purchase FCVs

▶ Commercial

- To launch market and build capacity

H₂ station and vehicle growth

Developing the Hydrogen Infrastructure





California Fuel Cell Partnership
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