

# How governments promote efficient vehicles through labeling program

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IEA Workshop



# ICCT mission and activities

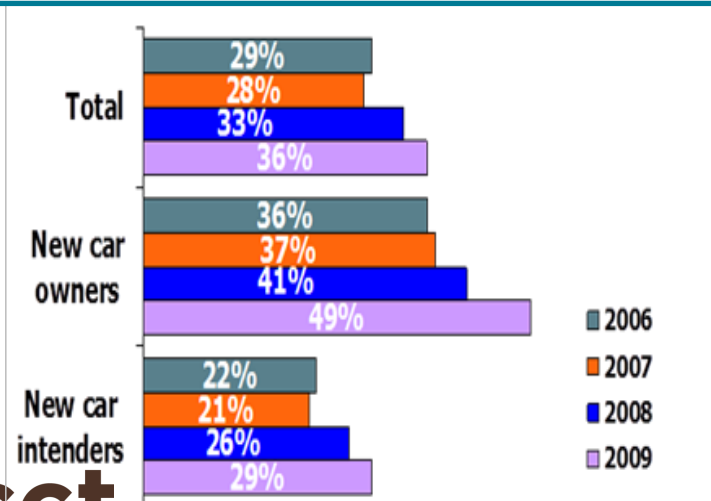
The mission of ICCT is to dramatically improve the environmental performance and efficiency of cars, trucks, buses and transportation systems in order to protect and improve public health, the environment, and quality of life.

- Non-profit research organization
- Air Pollution and Climate Impacts
- Focus on regulatory policies and fiscal incentives
- Activity across modes including aviation and marine
- Global outreach, with special focus on largest markets

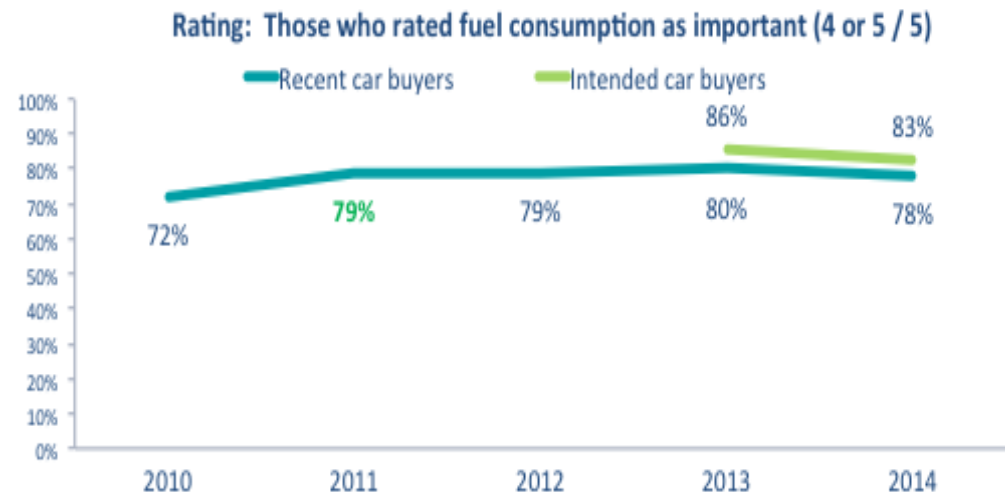
# Vehicle fuel economy labeling (VFEL) has many benefits

## VFEL can

- Raise consumer awareness
- Enable other policies
  - Fuel economy standards
  - Fiscal incentive
- Promote fuel efficient vehicle, contribute to fuel saving



UK awareness of labeling program.  
Source: Esposito G. (2014)

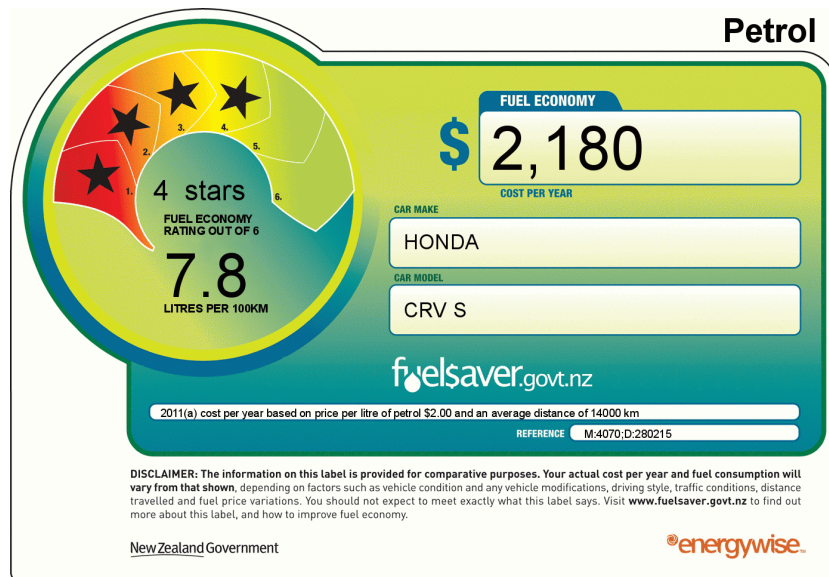


New Zealand.  
Source: Ipsos, (2014). Vehicle fuel economy labeling 2014.

# VFEL program has a wide scope

## VFEL include

Label displayed on  
car/in showroom



Online

The online label shows a silver car. Below the car, it says 'SE Sedan'. There is a 'Compare' button. The price is '\$18,125 Starting MSRP'. The EPA-Est. MPG is 'City/Hwy 26/36'.

SE Sedan

☐ Compare

\$18,125  
Starting MSRP<sup>1</sup>

EPA-Est. MPG  
City/Hwy 26/36<sup>2</sup>

Other media

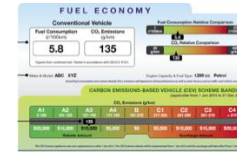


And associated consumer information campaign

# Implementation of vehicle fuel economy labeling program

## Adoption of vehicle fuel efficiency label

Mandatory ●  
Voluntary ●



Chinese Taipei ●

China ●

Brazil ●

New Zealand ●

Germany ●

Hong Kong, China ●

Netherlands ●

Austria ●

Australia ●

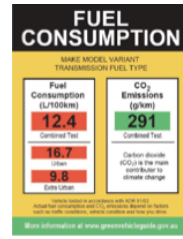
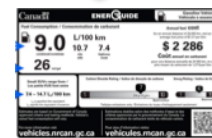
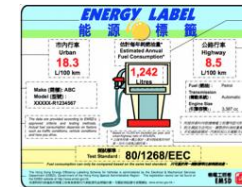
Japan ●

Canada ●

Korea ●

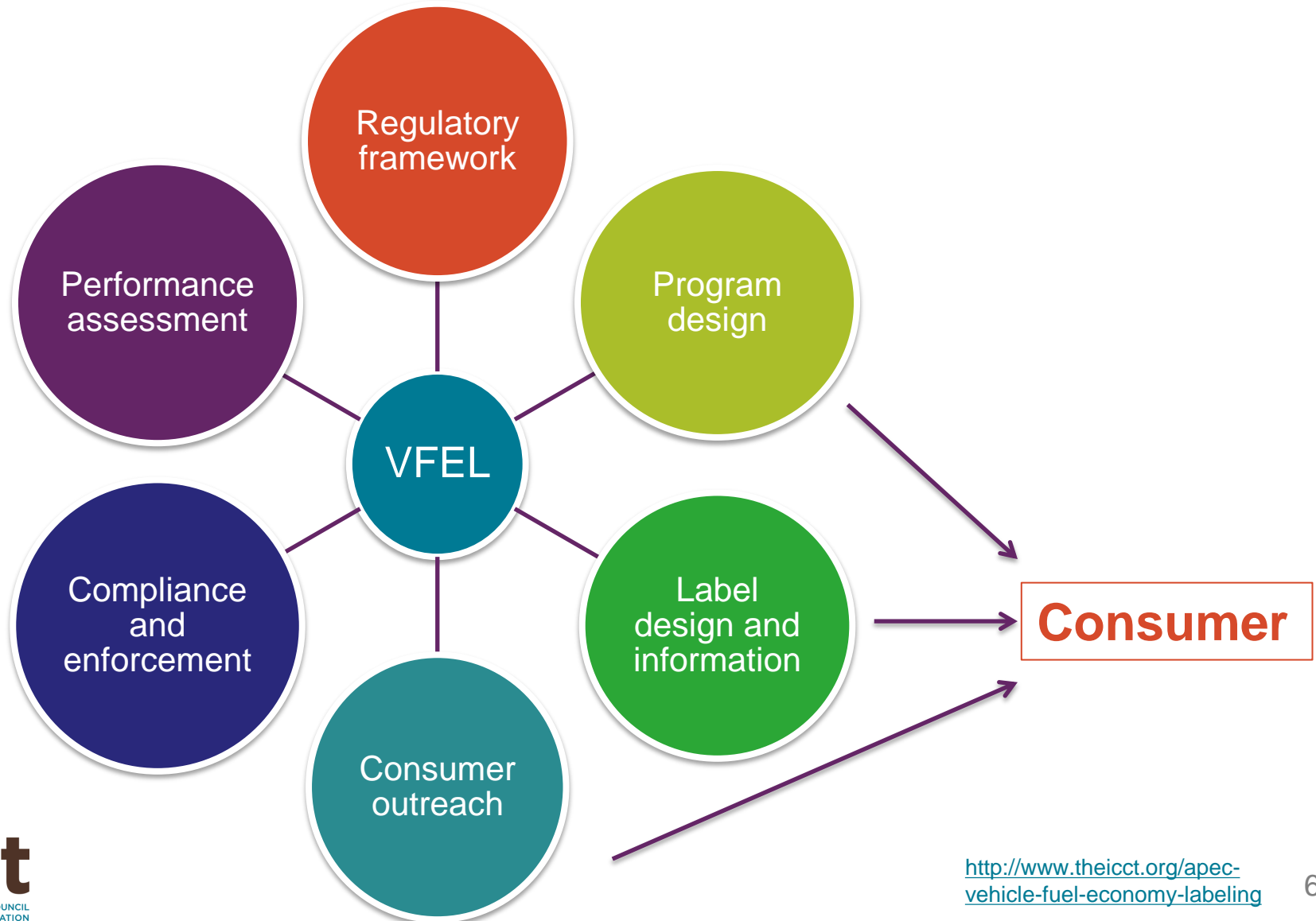
UK ●

US ●



# Six key elements for VFEL programs

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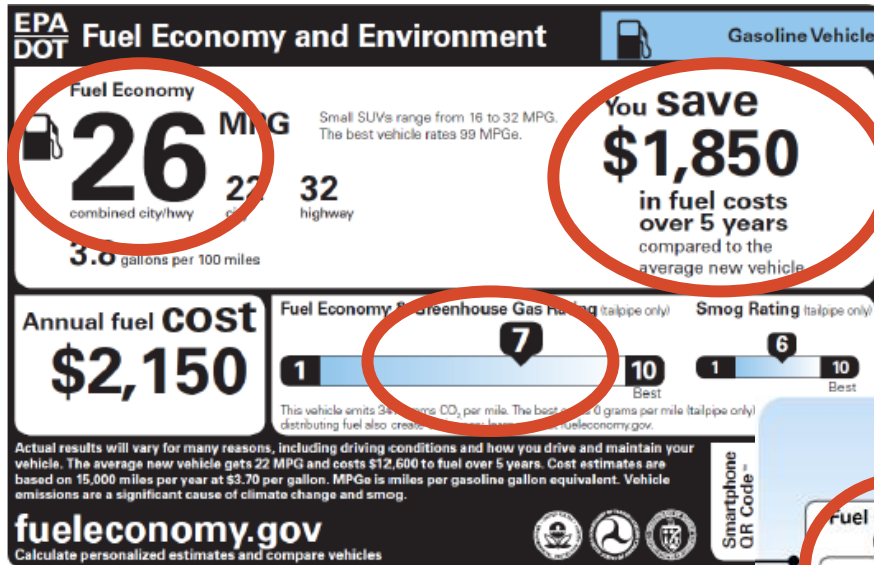
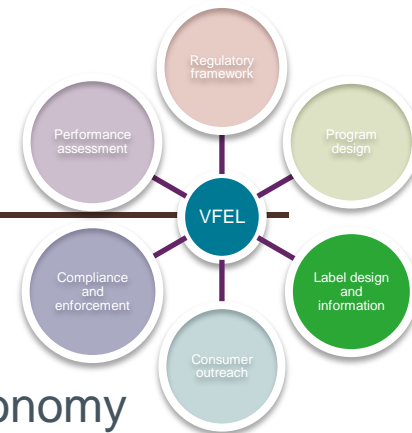
# Program design



- Wide scope
  - Mandatory
  - New + used
  - Passenger car + light commercial vehicle
  - Gasoline/diesel + other fuel types
- Learn consumer behavior/expectations
  - Regular market research and survey
  - Consumer attitudes changes over time
- Reflect real-world performance.
  - Collect in-use fuel consumption performance data
  - Use correction factor or revised test cycle

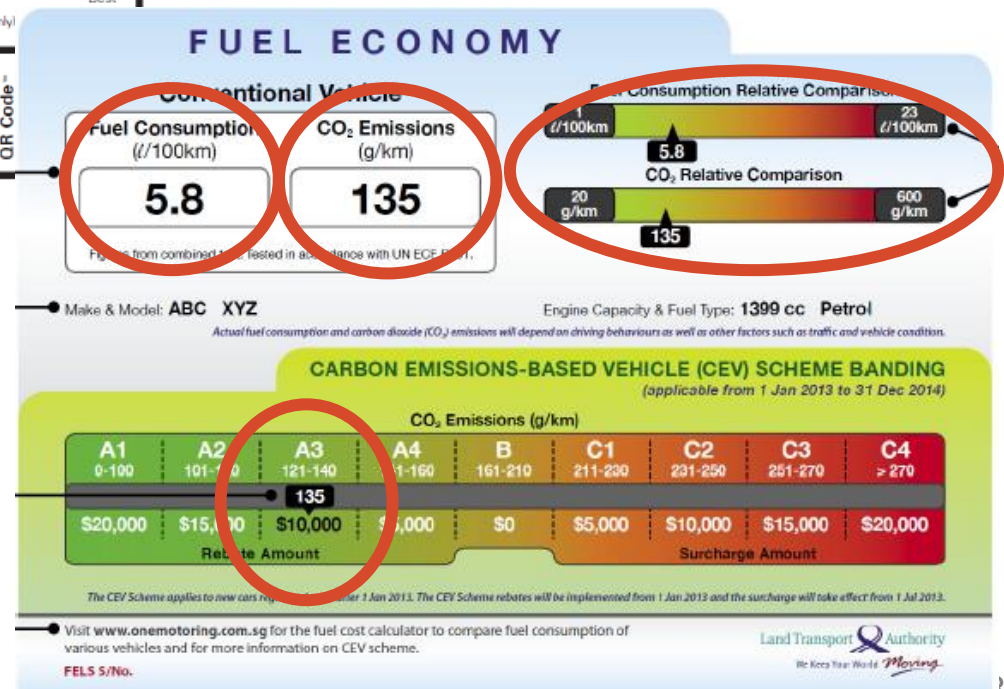


# Label design and information



## US label

- Absolute fuel economy value
- Fuel economy/GHG rating
- Annual fuel cost saving



## Singapore label

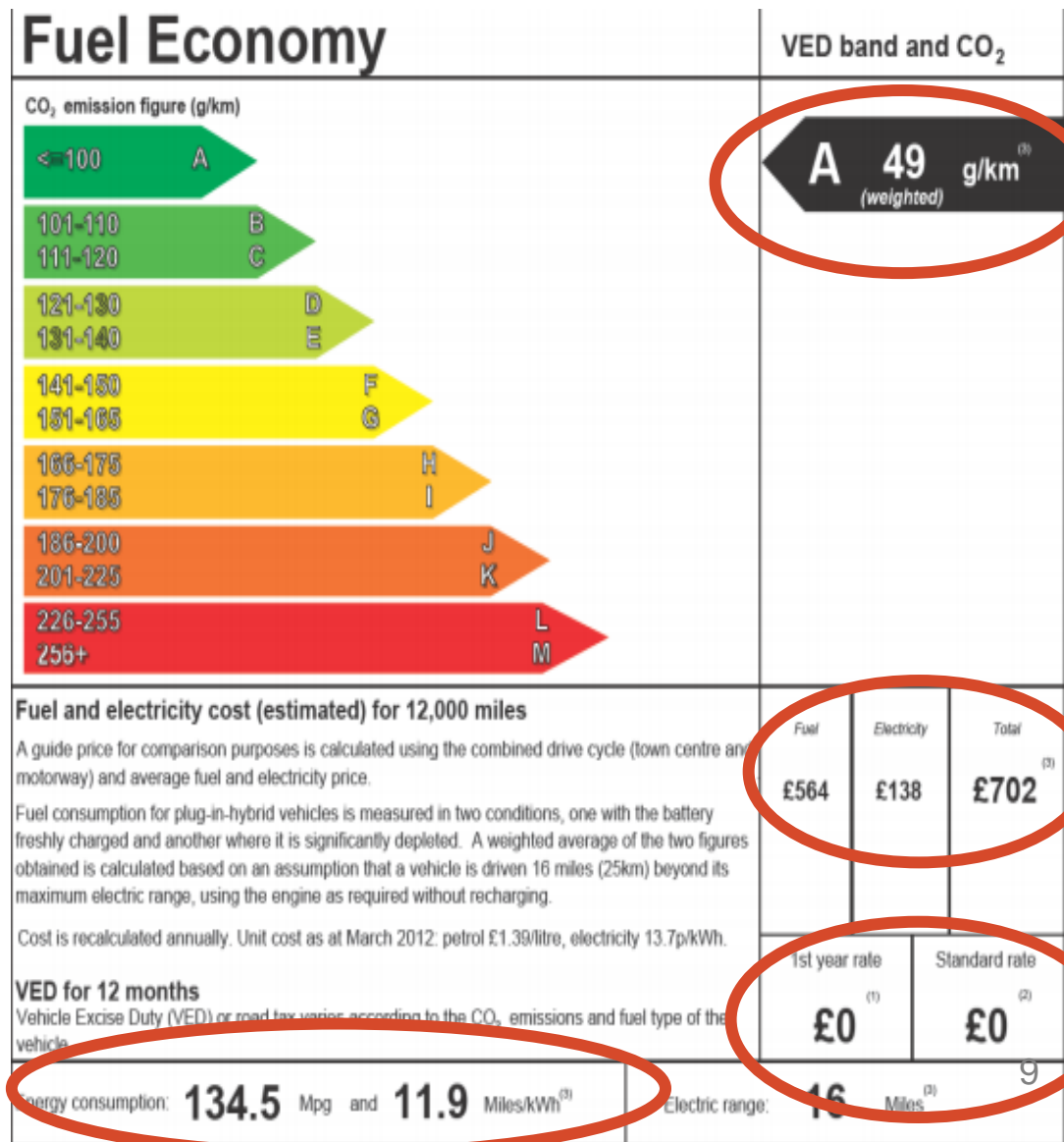
- Absolute fuel economy value
- Fuel economy/GHG range
- Fiscal policy information



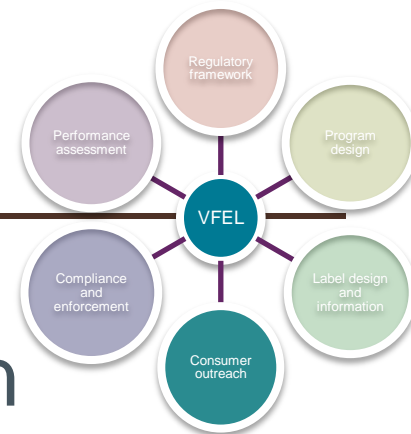
# Label information for alternative fuel vehicles

## Special considerations for alternative fuel vehicles

- Comparable (i.e. fuel consumption equivalent, CO<sub>2</sub> emissions)
- Fiscal information
- Others (Electricity consumption, range, charge time, operation information of AFVs)

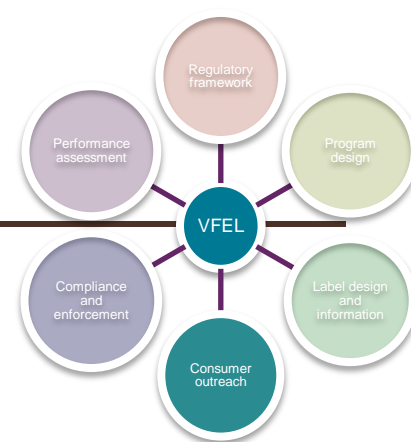


# Consumer outreach





- Importance of online information
  - UK- 80% carry out car research online
  - New Zealand- 27% people bought car online
- Information in promotional materials through other major media:
  - Electronic posters online
  - Printed or electronic promotional materials (e.g., newspaper, periodical magazine, catalogue)

# Consumer outreach



- VFEL website
  - Additional services beyond the label
  - User-friendly



Car 1			Car 2 (optional)		
Make:	B.M.W.		Make:	CHERY	
Model:	X5 M50D HID SR		Model:	J3 HATCHBACK 1.6 5MT 2WD	
Body Type:	Sport Utility Vehicle (SUV)		Body Type:	Hatchback	
Engine (cc):	2993		Engine (cc):	1597	
Maximum Power Output (kW):	280.0		Maximum Power Output (kW):	87.5	
Fuel Type:	Diesel		Fuel Type:	Petrol	
Transmission Type:	Automatic		Transmission Type:	Manual	
Turbo / Supercharged:	Yes		Turbo / Supercharged:	No	
Hybrid System:	No		Hybrid System:	No	

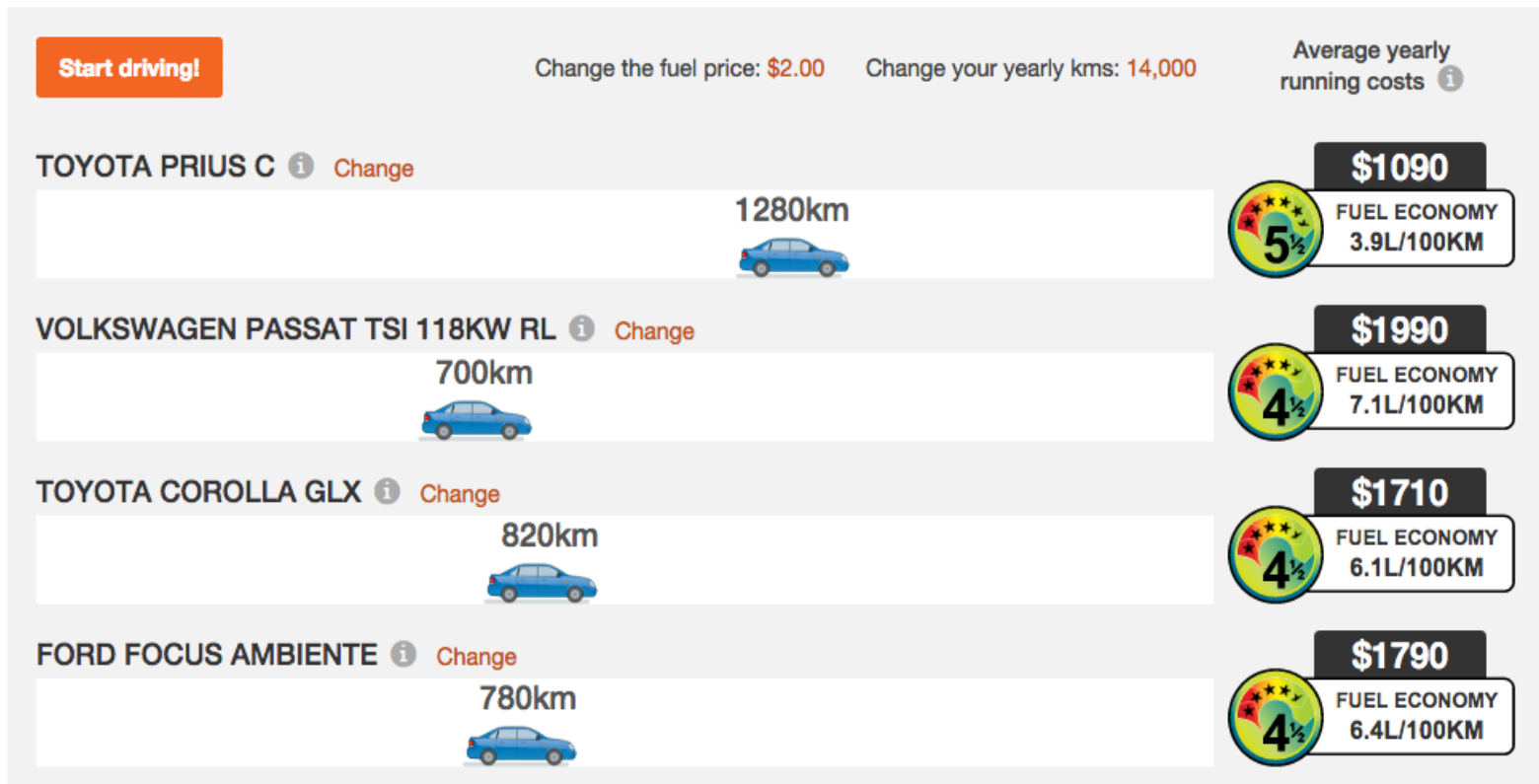
[Reset Car 1](#) [Get CO2 and Fuel Economy Data](#) [Reset Car 2](#)

[Download All Vehicle Fuel Economy Data](#)

### CO2 Fuel Economy Data

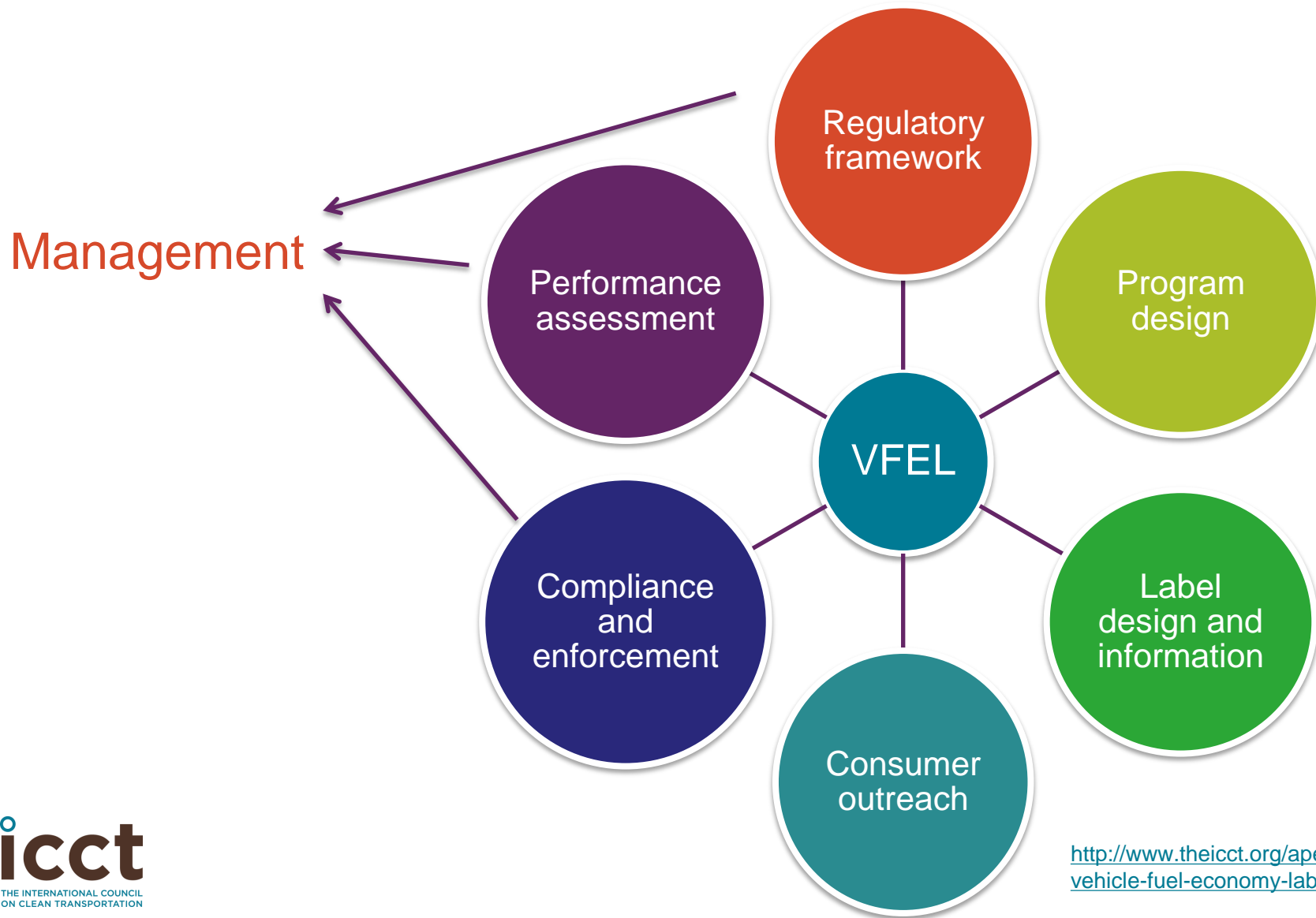
Car 1			Car 2		
		Diesel			Petrol
CO2	Urban	199.00 (g/km)	CO2	Urban	194.00 (g/km)
	Extra Urban	164.00 (g/km)		Extra Urban	144.00 (g/km)
	Combined	177.00 (g/km)		Combined	163.00 (g/km)
Fuel Economy	Urban	7.60 (L/100km)	Fuel Economy	Urban	8.30 (L/100km)
	Extra Urban	6.20 (L/100km)		Extra Urban	6.00 (L/100km)
	Combined	6.70 (L/100km)		Combined	6.90 (L/100km)

# Effective consumer outreach-New Zealand



# Six key elements for VFEL programs

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# More information

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## **A review and evaluation of vehicle fuel efficiency labeling and consumer information programs**

<http://www.theicct.org/apec-vehicle-fuel-economy-labeling>

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### **A Review and Evaluation of Vehicle Fuel Efficiency Labeling and Consumer Information Programs**

Asia-Pacific Economic Cooperation  
Energy Working Group

November 2015