## Yokohama

**Population 3,730,000** 

Number of households 1,646,676

Area 435.21km²

Nominal GDP JPY12.5050 trillion USD 109.6 billion

# **FutureCity Yokohama**

Kimihiro, Kuromizu Executive Director, City of Yokohama



#### **Action Plan for Climate Change Countermeasures**



#### Yokohama City Action Plan for Global Warming Countermeasures

Target: 80% reduction by 2050 (Base year: 2005) Mitigation Adaptation (Yokohama is a member of 2050 pathway platform)

Revised

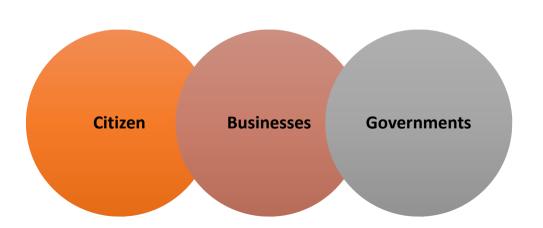
2014 : consider changes in the situation caused by the Great East Japan Earthquake.

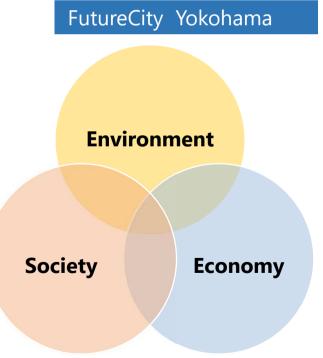
2018: consider the effectuation of Paris Agreements, trends in various countries, etc.

#### Yokohama City Climate Change Adaptation Policy

Established

.2016: Citizens, companies and government cooperate to promote various actions.







1.Energy Management

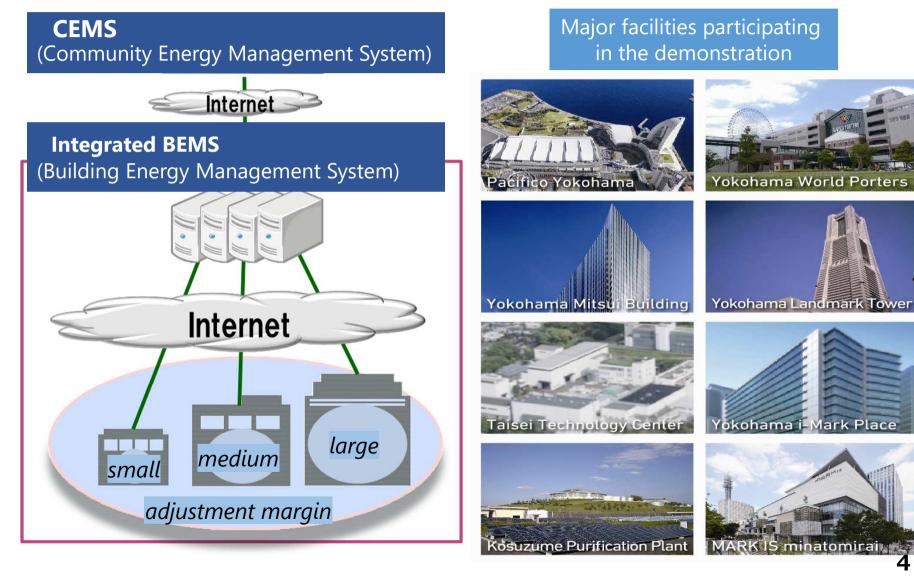
2.Hydrogen

3. Raising Awareness

#### **Energy Management: The Workings of BEMS**

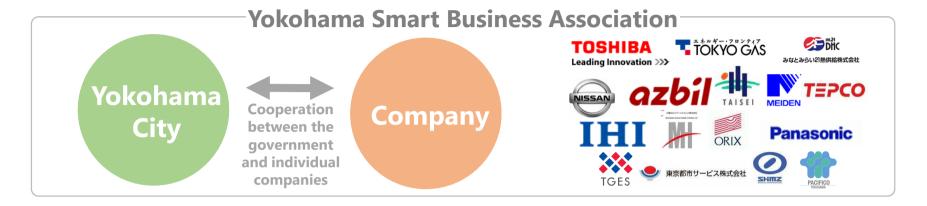


Maximum peak saving of 22.8% was confirmed with a demand response.



#### **Energy Management: Yokohama Smart Business Association**



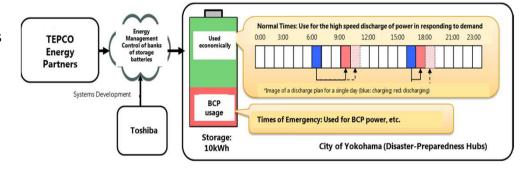


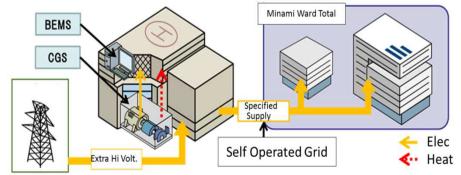
#### **Business for constructing virtual power plants**

- Elementary and junior high schools (18 in total) specified as local disaster prevention bases in Yokohama City
- Normally used by Tokyo Electric Power EP for demand adjustment.
- Used by Yokohama City as power for disaster prevention in emergencies.
- Planned to be developed at other public facilities.

# **Cooperative business between City University Medical Center and energy for Minami-ward General Office**

- Established a high-efficiency CGS at City University Medical Center.
- Send electricity generated by CGS to Minami-ward General Office.
- Effectively use heat generated from the power generation process.
  - → Improve the performance of disaster prevention systems, environmental properties and the economy.





#### Hydrogen



- Accelerating Introduction of FCVs
   We are using 7 Toyota's FCV "MIRAI"
   (at March 2017) as official car.
- Deployment of Hydrogen Stations
  We have 6 hydrogen stations in the city (at March 2017)



MIRAI (Yokohama City's official car)



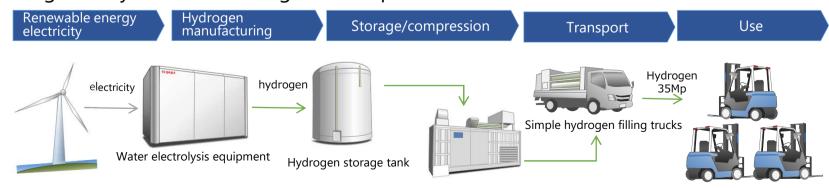


Yokohama Osanbashi Hydrogen station

Tsunashima Hydrogen station

 Demonstration Project of utilization of hydrogen using Yokohama City Wind Power Plant(2015~2018)

In addition to CO2-free hydrogen manufacturing using electricity generated by the Yokohama City Wind Power Plant, we will launch an initiative to build and demonstrate an integrated system from storage to transport to use.



### **Raising Awareness**



Raising Awareness in cooperation with various stakeholders such as NGO and private companies.









Participation in Earth Hour



Operation of Choimobi Yokohama



Establishment of a mobile hydrogen filling station at IKEA's Kohoku store

## **Conclusion**





Smart Illumination Yokohama 2016 // Photo: AMANO STUDIO