ZeM2All
Zero Emissions Mobility to All
Project developed under the framework of JSIP (Japan-Spain Innovation Program) for technological cooperation.

Participant Companies:
<table>
<thead>
<tr>
<th>LASTING</th>
<th>2011-2015</th>
<th>Kick-off</th>
<th>JSIP (Japan-Spain Innovation Program)</th>
<th>E-Mobility ICT Cities R&amp;D Centres</th>
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<tbody>
<tr>
<td>FINANCING</td>
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<td>Kick-off</td>
<td>BUDGET SPAIN</td>
<td>15 M €</td>
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<td></td>
<td></td>
<td>05.2012</td>
<td>COMPANIES JAPAN</td>
<td>45 M €</td>
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CDTI, NEDO, COMPANIES

Málaga

Ayuntamiento de Málaga

EVS 27

The 27th INTERNATIONAL ELECTRIC VEHICLE SYMPOSIUM & EXHIBITION

Ayuntamiento de Málaga
The 27th INTERNATIONAL ELECTRIC VEHICLE SYMPOSIUM & EXHIBITION
To develop a recharging infrastructure, according to user's needs, integrated in a distribution network, with information and rational use of resources, related systems and communication technologies.

Developing a platform under open eco-sustainable mobility, enabling the transfer of knowledge, experiences and indicators for the implementation of electric vehicles in our society.

Development of systems that will allow the integration and control of all these elements in the networks.
Targets

- Demonstrate technologies related to "smart communities"
- Prepare urban infrastructure for large-scale incorporation of next generation vehicles
- Implementation of a new infrastructure that includes management systems and facilities for EV recharging
- Efficient management of EV fleets

- Implementation of quick charging stations control systems
- Navigation to best quick charging point
- Coordinated management of EV parking and recharging
- Mitigate the impact of recharge on the power grid
- Improve EV user comfort
- New added value services
- Reduction of CO2 emissions
Activity 1. Development of the charging infrastructure solutions for electric cars

Activity 2. Distribution network for electric charging

Activity 3. ICT Platform

Activity 4. Information systems of electric mobility

Activity 5. Social Media Mobility
Quick charging technologies

- CHAdeMO protocol
- 4 stations Hitachi with 4 chargers (60 kW max)
- 2 stations Mitsubishi with 2 chargers and batteries (33 kW each)
- 3 stations Mitsubishi with 1 charger (50 kW each)
Quick charging stations

9 stations with 23 chargers
### Quick charging stations

<table>
<thead>
<tr>
<th>Ref</th>
<th>City</th>
<th>Location</th>
<th>Chargers</th>
<th>Power (kW)</th>
</tr>
</thead>
<tbody>
<tr>
<td>#1</td>
<td>Málaga</td>
<td>Airport</td>
<td>4</td>
<td>60</td>
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<tr>
<td>#2</td>
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<td>Parking</td>
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<td>60</td>
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<td>#3</td>
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<td>Parking</td>
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<tr>
<td>#4</td>
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<td>Parking</td>
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<td>60</td>
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<tr>
<td>#5</td>
<td>Málaga</td>
<td>Municipal Premises</td>
<td>2</td>
<td>33</td>
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<td>#6</td>
<td>Málaga</td>
<td>Access to Mall</td>
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<td>33</td>
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<td>#7</td>
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<td>#8</td>
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<td>#9</td>
<td>Marbella</td>
<td>TF&amp;Congress Centre</td>
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<td>50</td>
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</table>
Quick charging stations
V2G charging station

- 6 chargers (Endesa technology)
- Located on Municipal Premises of “Tabacalera” site
- V2G: EV communicates with power grid and can give energy from its batteries
- Municipal participation -

- Providing premises for the information and control centre
- Municipal activities -

- Provide 7 quick chargers locations
- Cooperation with Fuengirola and Marbella to locate and install 2 Quick Chargers
- To use 20 EV (45 finally)
- 75% annual tax bonus
- Municipal activities -

- Access to restricted areas of the historical city center
- Reserve free surface parking for EV
- Bonus rates for EV parking (SARE zones)
- Bonus rates for EV parking (Municipal Parking)
- Reserve public parking spaces for quick charging
- Signaling charging points and exclusive EV parking on road
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