

## Scooter terminology and operational models (13.07.20)

<b>Parking models</b> NB -often there is a mix of models within a scheme	<b>Description</b>	<b>Positive considerations</b>	<b>Challenges</b>
<b>Free floating</b> (dockless)	Scooters can be left anywhere according to parking rules.	<ul style="list-style-type: none"> <li>• Fast and low cost to implement</li> <li>• Allows greater convenience for users dropping off and picking up where they like.</li> </ul>	<ul style="list-style-type: none"> <li>• Can increase redistribution costs if users don't naturally return scooters to places where they are required.</li> <li>• Can increase incidents of poor parking.</li> <li>• Can speed up increase opportunities for faster theft and criminal damage although this can occur in all models.</li> </ul>
<b>Geo-fenced* station / bay / parking zone based / virtual docks</b> (no physical markings)	Scooters must be parked in areas marked only on the app	<ul style="list-style-type: none"> <li>• Fast and low cost to implement, locations are added to apps although can still require planning and land agreements.</li> <li>• Flexible adjustment of stations as experience of use develops is possible.</li> </ul>	<ul style="list-style-type: none"> <li>• Reduces user's ability to take the scooter to their final destination unless the network is extensive</li> <li>• Requires technology capable of enforcing bays alongside, strong user education, incentives or penalties to enforce.</li> <li>• Can speed up increase opportunities for faster theft and criminal damage although this can occur in all models.</li> </ul>
Physical stations / bay / parking zone / dock <b>with no-lock mechanism</b> eg – painted and signed area.	Scooters must be parked in areas marked on the ground	<ul style="list-style-type: none"> <li>• Relatively fast and low cost to implement depending upon TRO requirements</li> <li>• Visible advertisement for the scooters.</li> <li>• Clear locations for users to understand where to park and pick up scooters</li> <li>• Could allow greater surveillance of scooters in certain locations.</li> </ul>	<ul style="list-style-type: none"> <li>• Still requires work to plan, consult and agreements with landowners.</li> <li>• Reduces user's ability to take the scooter to their final destination unless the network is extensive.</li> <li>• May still require strong user education, incentives or penalties for proper parking.</li> <li>• Can speed up increase opportunities for faster theft and criminal damage although this can occur in all models.</li> </ul>

Physical station/ bay /dock with <b>lock to mechanisms</b>	Scooters must be parked using a physical device to which the scooter can connect.	<ul style="list-style-type: none"> <li>• Visible location from which users can pick up and drop off scooters</li> <li>• Could create a barrier to pick up and drop off for users reducing utilisation.</li> <li>• Possible lack or delays in supply.</li> </ul>	<ul style="list-style-type: none"> <li>• Requires additional hardware to be bought and deployed which could add to implementation times.</li> <li>• Requires additional marketing content showing how the lock works.</li> <li>• Potential additional security as scooters cannot easily be removed without payment or breaking the security device.</li> </ul>
Physical station/ bay /docks with lock-to mechanism and <b>charging</b>	As above with charging	<ul style="list-style-type: none"> <li>• As above reduces need for battery swapping and avoids low charge</li> </ul>	<ul style="list-style-type: none"> <li>• Requires work to link up electricity which can be costly and time-consuming.</li> </ul>
<b>Hire periods</b>			
E-scooter share	Priced to encourage short /last mile trips of few miles	<ul style="list-style-type: none"> <li>• Encourages multiple use of each vehicle, maximising efficiency of the scheme</li> <li>• Supports short cross city and last mile multi-modal trips</li> <li>• Pay only when using the scooters</li> </ul>	<ul style="list-style-type: none"> <li>• Requires redistribution and higher cost of management</li> <li>• Costs harder to predict at least for new users</li> </ul>
Short term rental	A model which offers day hires from convenient pick up points, priced to encourage day hires.	<ul style="list-style-type: none"> <li>• Allows users to take one scooter for their daily needs.</li> <li>• Encourages users to take responsibility for security.</li> <li>• Reduces Covid transmission.</li> <li>• Predictable costs</li> </ul>	<ul style="list-style-type: none"> <li>• Responsibility on the user to look after during the day / carry on public transport.</li> <li>• Scooter will be out of use much of the day reducing efficiency of the fleet.</li> <li>• Pay for whole period when not in use</li> </ul>
Longer term rental	A model which offers rental for a week	<ul style="list-style-type: none"> <li>• Allows users to take one scooter for their weekly needs and ensure it is there for all journeys including out of the city centre.</li> <li>• Require less pick up points and less use of an app to use.</li> <li>• Encourages users to take responsibility for security.</li> <li>• Less redistribution required</li> <li>• Reduces Covid transmission.</li> <li>• Predictable costs to add to budgets</li> </ul>	<ul style="list-style-type: none"> <li>• Responsibility on the user to look after during the day / carry on public transport.</li> <li>• Scooter will be out of use much of the day reducing efficiency of</li> <li>• Pay for whole period when not in use</li> </ul>

Lease	A model where users sign up for a regular monthly payment in return to use one scooter allocated to them.	<ul style="list-style-type: none"> <li>• Allows users to take one scooter for all their appropriate journeys including out of the city centre.</li> <li>• Allows coverage out of city centre.</li> <li>• Require less pick up points</li> <li>• Encourages users to take responsibility for security.</li> <li>• Reduces Covid transmission.</li> <li>• Less redistribution required.</li> </ul>	<ul style="list-style-type: none"> <li>• Responsibility on the user to look after during the day / carry on public transport.</li> <li>• Scooter will be out of use much of the day reducing efficiency of the fleet.</li> <li>• Pay for whole period when not in use</li> </ul>
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\*Marking out of geographical spaces virtually using GPS, blue tooth or other technology. The geo-fence links to the app to indicate where the scooter is and whether it is in a location it can be parked or not. The geo-fence can apply to, whole trial area perimeter, areas to park, or areas not to park.