<launch>

<arg name="use\_map\_topic" default="false"/>

<arg name="scan\_topic" default="/robot1/scan"/>

<arg name="initial\_pose\_x" default="0.8947"/>

<arg name="initial\_pose\_y" default="1.3903"/>

<arg name="initial\_pose\_a" default="0.0"/>

<arg name="odom\_frame\_id" default="robot1\_tf/odom"/>

<arg name="base\_frame\_id" default="robot1\_tf/base\_link"/>

<arg name="global\_frame\_id" default="map"/>

<node pkg="amcl" type="amcl" name="amcl\_1" output="screen">

<param name="use\_map\_topic" value="true"/>

<!-- Publish scans from best pose at a max of 10 Hz -->

<param name="odom\_model\_type" value="diff"/>

<param name="odom\_alpha5" value="0.1"/>

<param name="gui\_publish\_rate" value="10.0"/>

<param name="laser\_max\_beams" value="60"/>

<param name="laser\_max\_range" value="12.0"/>

<param name="min\_particles" value="500"/>

<param name="max\_particles" value="2000"/>

<param name="kld\_err" value="0.05"/>

<param name="kld\_z" value="0.99"/>

<param name="odom\_alpha1" value="0.2"/>

<param name="odom\_alpha2" value="0.2"/>

<!-- translation std dev, m -->

<param name="odom\_alpha3" value="0.2"/>

<param name="odom\_alpha4" value="0.2"/>

<param name="laser\_z\_hit" value="0.7"/>

<param name="laser\_z\_short" value="0.05"/>

<param name="laser\_z\_max" value="0.05"/>

<param name="laser\_z\_rand" value="0.3"/>

<param name="laser\_sigma\_hit" value="0.2"/>

<param name="laser\_lambda\_short" value="0.1"/>

<param name="laser\_model\_type" value="likelihood\_field"/>

<!-- <param name="laser\_model\_type" value="beam"/> -->

<param name="laser\_likelihood\_max\_dist" value="2.0"/>

<param name="update\_min\_d" value="0.25"/>

<param name="update\_min\_a" value="0.2"/>

<param name="base\_frame\_id" value="$(arg base\_frame\_id)"/>

<param name="odom\_frame\_id" value="$(arg odom\_frame\_id)"/>

<param name="global\_frame\_id" value="$(arg global\_frame\_id)" />

<param name="resample\_interval" value="1"/>

<!-- Increase tolerance because the computer can get quite busy -->

<param name="transform\_tolerance" value="1.0"/>

<param name="recovery\_alpha\_slow" value="0.0"/>

<param name="recovery\_alpha\_fast" value="0.0"/>

<param name="initial\_pose\_x" value="$(arg initial\_pose\_x)"/>

<param name="initial\_pose\_y" value="$(arg initial\_pose\_y)"/>

<param name="initial\_pose\_a" value="$(arg initial\_pose\_a)"/>

<remap from="scan" to="$(arg scan\_topic)"/>

<remap from="initialpose" to="/robot1/initial\_pose"/>

<remap from="amcl\_pose" to="/robot1/amcl\_pose"/>

<remap from="particlecloud" to="/robot1/particlecloud"/>

</node>

</launch>