**Problem:**
Storm water runoff is known for picking up bacteria from animal waste, which proceeds to flow into the oceans. When the concentration of fecal matter is high there is potential for the spread of disease. In 2011 the especially high levels caused thousands of beaches to post warnings against swimming in the water.

**Solution:**
By using storm water filtration systems the fecal saturated rain water can be redirected to flow below the beach where it can be filtered and purified by the sand. The open-bottom, 5ft wide plastic tubes are placed about 2 ft below the sand, creating new dunes and redirecting the storm water so the bacteria can be killed before it enters the ocean.

**Results:**
The contaminated storm water flows into the system before filtering through the gravel which spreads it out over the sand. The runoff becomes diluted and purifies so the remaining water has bacteria levels similar to that of typical ground water.