We designed a streetlight fixture that reduces light pollution, while being more efficient than traditional ones. In addition, it provides much needed cooling and biodiversity increase within urban areas through an evaporation system and the inclusion of indigenous plants that generate and insect highway.

**PROBLEM & OPPORTUNITY**
Light pollution is rising alongside urbanization and the misuse of LEDs. Its consequences on health have been long ignored. We can drastically reduce it by the replacement of misplaced and outdated fixtures. In the Netherlands, 200,000 streetlights are replaced per year.

**SOLUTION**
Our design builds on the characteristics of LEDs to distribute their output evenly and create a comfortable glow. The source is kept out of sight. Light that would be lost is captured and directed only where it is useful. The fixture fits preexisting street poles.

**BIOMIMICRY IN PRACTICE**
We utilize a light source based on the firefly’s cuticle to emit light efficiently. The light is conducted through a mechanism that avoids loss, same that allows the silver ant to survive in the desert. To focus light, we use the lobster’s strategy that employ reflection instead of refraction.

**REVENUE MODEL**
We plan to work with a licensing model. A partnership with long established players of the light manufacturing industry would enable to rapidly produce and sell our design.

**TRACTION**
The street lighting providers and stakeholders recognizes the value of our proposition. Potential customers, including municipalities and universities, have expressed strong interest. Different stakeholders share and support the concern to tackle light pollution. We are currently testing the technical assumptions over which our design works.

**TEAM**
We are a group of students brought together by a masters in bio inspired innovation, showcasing our commitment to develop these ideas. The program has provided us the lessons to identify and create regenerative solutions, such as nature inspired and design thinking.

**NEXT STEPS**
Our main objective is to have a prototype to assess its performance in a real environment and showcase to potential customers, partners and investors, such as municipalities, urban developers and manufacturers,