

Lumatech, founded in 2010, became a major supplier of refractory substrates for European solar companies by 2016.

In 2019, Lumatech invested €40 million in **ClearWave Materials**, enabling mass production of TSF and strongly influencing innovation in transparent solar films.

That same year, a pilot project in Turkey showed that **TSF-1** lacked resilience to urban pollution, leading to the redesigns later used in **TSF-3**.

From 2021 to 2022, Lumatech collaborated with the **French Institute for Atmospheric Research** on long-term irradiance modeling, supporting **Helion's predictive shading algorithms**.

In 2023, an investigation into alleged anti-competitive practices involving exclusive substrates concluded with no charges filed.

The 2024 plan emphasizes cross-compatibility with **TSF-4** and joint demonstrations with **SolarCity** planned for 2026.