

HORIZON
2020

New Diffractive Optical Element Lenses and related industrial services

Fact Sheet

Project Information

SUPERvisionary

Grant agreement ID: 946897

DOI

[10.3030/946897](https://doi.org/10.3030/946897) 

Project closed

EC signature date

3 April 2020

Start date

1 March 2020

End date

28 February 2022

Funded under

INDUSTRIAL LEADERSHIP - Innovation In SMEs

Total cost

€ 3 242 860,00

EU contribution

€ 2 270 000,00

Coordinated by

NIL TECHNOLOGY APS



Denmark

Project description

New highly advanced lens solution for optical components

A growing demand for 3D-enabled consumer electronic devices is driving the integration of 3D imaging and sensing technology. This is key in the technological revolution of autonomous vehicles, next-generation consumer electronics and human-machine interfaces. But 3D sensing remains in early stages in terms of accuracy and range of sensors. In this context, the EU-funded SUPERvisionary project will promote a new highly advanced flat diffractive lens solution for optical components, as well as replication methods for the high-volume production of these components. Flat optics based on diffractive optical elements have enormous

potential to solve present challenges in 3D sensing technologies by providing smaller and cheaper lenses with better performance.

Fields of science (EuroSciVoc)

[engineering and technology](#) > [mechanical engineering](#) > [vehicle engineering](#) > [automotive engineering](#) > [autonomous vehicles](#)

[natural sciences](#) > [computer and information sciences](#) > [artificial intelligence](#) > [computer vision](#) > [facial recognition](#)

[social sciences](#) > [political sciences](#) > [political transitions](#) > [revolutions](#)

[engineering and technology](#) > [electrical engineering, electronic engineering, information engineering](#) > [electronic engineering](#) > [sensors](#)

[engineering and technology](#) > [electrical engineering, electronic engineering, information engineering](#) > [information engineering](#) > [telecommunications](#) > [mobile phones](#)



Keywords

[time-of-flight](#)

[LIDAR](#)

[mobile phone camera](#)

[3D sensing](#)

[3D imaging](#)

[autonomous vehicles](#)

[optical components](#)

[wafer-level optics](#)

[replication](#)

[machine vision](#)

[diffractive optical elements](#)

[flat optics](#)

Programme(s)

[H2020-EU.2.3. - INDUSTRIAL LEADERSHIP - Innovation In SMEs](#)

MAIN PROGRAMME

[H2020-EU.3. - PRIORITY 'Societal challenges](#)

[H2020-EU.2.1. - INDUSTRIAL LEADERSHIP - Leadership in enabling and industrial technologies](#)

Topic(s)

[EIC-SMEInst-2018-2020 - SME instrument](#)

Call for proposal

[H2020-EIC-SMEInst-2018-2020](#)

[See other projects for this call](#)

Sub call

H2020-EIC-SMEInst-2018-2020-3

Funding Scheme

[SME - SME instrument](#)

Coordinator



NIL TECHNOLOGY APS

Net EU contribution

€ 1 974 250,00

Total cost

€ 3 242 860,00

Address

HALDOR TOPSOES ALLE 1

2800 Kongens Lyngby

 **Denmark** 

SME 

Yes

Region

Danmark > Hovedstaden > Københavns omegn

Activity type

Private for-profit entities (excluding Higher or Secondary Education Establishments)

Links

[Contact the organisation](#)  [Website](#) 

[Participation in EU R&I programmes](#) 

[HORIZON collaboration network](#) 

Participants (1)

NILT SWITZERLAND GMBH

 Switzerland

Net EU contribution

€ 295 750,00

Address

SEESTRASSE 87

8810 Horgen 

SME 

Yes

Region

Schweiz/Suisse/Svizzera > Zürich > Zürich

Activity type

Private for-profit entities (excluding Higher or Secondary Education Establishments)

Links

[Contact the organisation](#) 

[Participation in EU R&I programmes](#) 

[HORIZON collaboration network](#) 

Total cost

€ 422 500,00

Last update: 6 September 2024

Permalink: <https://cordis.europa.eu/project/id/946897>

European Union, 2025