

Title (en)

SINGLE-PIECE OPTICAL PART MADE OF TRANSPARENT OR TRANSLUCENT MATERIAL WITH INACTIVE SURFACE WITH DIFFUSING PORTION

Title (de)

OPTISCHES MONOBLOCKTEIL AUS DURCHSICHTIGEM ODER LICHTDURCHLÄSSIGEM MATERIAL MIT INAKTIVER OBERFLÄCHE, DIE EINEN LICHTSTREUENDEN ABSCHNITT UMFASST

Title (fr)

PIECE OPTIQUE MONOBLOC EN MATERIAU TRANSPARENT OU TRANSLUCIDE A SURFACE INACTIVE AVEC PORTION DIFFUSANTE

Publication

EP 3628915 A1 20200401 (FR)

Application

EP 19195640 A 20190905

Priority

FR 1858944 A 20180928

Abstract (en)

[origin: US2020103087A1] A single-piece optical part made of transparent or translucent material, comprising a plurality of active surfaces arranged to form a beam, including an entrance dioptric interface and an exit dioptric interface, inactive surfaces joining the active surfaces, at least one of the inactive surfaces comprising a scattering segment so as to scatter the rays that reach it.

Abstract (fr)

La présente invention se rapporte à une pièce optique (1) monobloc en matériau transparent ou translucide comprenant :- une pluralité de surfaces actives agencées pour mettre en forme un faisceau, dont un dioptre d'entrée et un dioptre de sortie (5),- des surfaces inactives (6) joignant les surfaces actives, au moins une des surfaces inactives présentant une portion diffusante (7) de manière à diffuser les rayons qui l'atteignent.

IPC 8 full level

F21S 41/275 (2018.01); **F21S 41/147** (2018.01); **F21S 41/27** (2018.01)

CPC (source: CN EP US)

F21S 41/141 (2017.12 - CN); **F21S 41/148** (2017.12 - EP); **F21S 41/151** (2017.12 - EP); **F21S 41/20** (2017.12 - CN); **F21S 41/27** (2017.12 - EP); **F21S 41/275** (2017.12 - EP); **F21S 41/285** (2017.12 - US); **F21S 41/32** (2017.12 - CN); **F21S 41/322** (2017.12 - US); **F21S 41/365** (2017.12 - US); **F21V 5/00** (2013.01 - CN); **F21V 5/008** (2013.01 - US); **F21V 7/04** (2013.01 - CN); **F21S 41/275** (2017.12 - US); **F21Y 2115/10** (2016.07 - CN)

Citation (applicant)

FR 3039883 A1 20170210 - VALEO VISION [FR]

Citation (search report)

- [XAY] US 2014146555 A1 20140529 - CHOI KOOK YOUNG [KR], et al
- [X] DE 202018002427 U1 20180525 - HYUNDAI MOBIS CO LTD [KR]
- [X] DE 102008003929 A1 20080717 - KOITO MFG CO LTD [JP]
- [X] JP 2014063604 A 20140410 - ICHIKOH INDUSTRIES LTD
- [X] US 2012069576 A1 20120322 - CHANG HSIU-PING [TW]
- [Y] DE 102013002965 A1 20140828 - DOCTER OPTICS SE [DE]

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

EP 3628915 A1 20200401; EP 3628915 B1 20220629; CN 110966569 A 20200407; CN 110966569 B 20240220; FR 3086735 A1 20200403; FR 3086735 B1 20210625; US 11255504 B2 20220222; US 2020103087 A1 20200402

DOCDB simple family (application)

EP 19195640 A 20190905; CN 201910932126 A 20190927; FR 1858944 A 20180928; US 201916575669 A 20190919