

## Search History:

### Limited Classification Search

The Patent Analyst performed a limited classification search within the following US, IPC, CPC, ECLA, or F-Term classification areas:

CPC Class/Subclass(es): G02B 15/14; G02B 3/02; G02B 15/15; G02B 15/163; G02B 15/22 (2018.08)

IPC (8) Class/Subclass(es): G02B 15/14; G02B 3/02; G02B 15/15; G02B 15/163; G02B 15/22 (2018.01)

U.S. Class/Subclass(es): 359/362; 359/380; 359/201.1; 359/210.1

See Global Search Results.

### Global Patent Literature Text Search

The Patent Analyst performed the following global text search, which was not limited by classification but may or may not have been limited by other criteria:

Questel Orbit: <https://www.orbit.com>

#	Search query	Results
1	((BAR W CODE) AND SCANNER AND HOUSING AND (BASE W LENS) AND (MOVING W LENS) AND (IMAGE W SENSOR))/TI/AB/IW/TX AND PD <= 2017-09-29	0
2	(SCANNER AND HOUSING AND (BASE W LENS) AND (MOVING W LENS) AND (IMAGE W SENSOR))/TI/AB/IW/TX AND PD <= 2017-09-29	0
3	((BAR W CODE) AND SCANNER AND HOUSING AND BASE AND LENS AND (IMAGE W SENSOR))/TI/AB/IW/TX AND PD <= 2017-09-29	1019
4	((BAR W CODE) AND SCANNER AND HOUSING AND BASE AND LENS AND (IMAGE W SENSOR) AND MAGNIF+)/TI/AB/IW/TX AND PD <= 2017-09-29	347
5	((BAR W CODE) AND SCANNER AND HOUSING AND BASE AND LENS AND (IMAGE W SENSOR) AND MAGNIF+ AND (MOVE 4D LENS) AND (VOICE 4D COIL))/TI/AB/IW/TX AND PD <= 2017-09-29	15
6	((BAR W CODE) AND SCANNER AND HOUSING AND BASE AND LENS AND (IMAGE W SENSOR) AND MAGNIF+ AND (MOVE 4D LENS) AND (VOICE 4D COIL))/DESC/ODES AND PD <= 2017-09-29	15
7	(SCAN+ AND HOUSING AND BASE AND LENS AND (IMAGE W SENSOR) AND MAGNIF+ AND (MOVE 4D LENS) AND (VOICE 4D COIL))/DESC/ODES AND PD <= 2017-09-29	61
8	..SIMILARITY SS 7 RANKED 11	21168
9	..SIMILARITY SS 7 RANKED 11	21168
10	((LATERAL W MAGNIF+) AND (CENTRAL W MAGNIF+) AND LENS AND MOVABLE AND OBJECT AND IMAGE)/DESC/ODES AND PD <= 2017-09-29	0

11	((LATERAL 4D MAGNIF+) AND (CENTRAL 4D MAGNIF+) AND LENS AND MOVABLE AND OBJECT AND IMAGE)/DESC/ODES AND PD <= 2017-09-29	17
12	(IMAGE AND LENS AND MOVABLE AND (SECOND 4D MAGNIFICATION) AND LATERAL AND MEDIAL)/DESC/ODES AND PD <= 2017-09-29	45
13	(IMAGE AND ZONE AND MAGNIFICATION)/DESC/ODES AND PD <= 2017-09-29	65602
14	(IMAGE AND ZONE AND MAGNIFICATION AND MOVABLE AND LENS AND HOUSING AND SCAN)/DESC/ODES AND PD <= 2017-09-29	2886
15	(SCANNER AND FISH-EYE AND LENS AND IMAGE)/DESC/ODES AND PD <= 2017-09-29	467
16	(IMAGE AND (LATERAL W MAGNIFI+) AND ((MEDIAL OR CENT+) W MAGNIF+))/DESC/ODES AND PD <= 2017-09-29	3
17	(JP5621133)/PN AND PD <= 2017-09-29	1
18	(G02B-003/02)/IPC	3621
19	(G02B-003/02)/CPC	583
20	(G02B-015/14)/CPC	1424
21	(G02B-015/14)/IPC	6911
22	(G02B-015/22)/IPC	660
23	(G02B-015/22)/CPC	206
24	(G02B-015/15)/CPC	108
25	(G02B-015/15)/IPC	373
26	(G02B-015/163)/IPC	855
27	(G02B-015/163)/CPC	260
28	(359201100)/PCL	435
29	(359210100)/PCL	180
30	(359362)/PCL	229
31	(359380)/PCL	235
32	3 AND 18	2
33	3 AND 19	1
34	3 AND 20	0
35	3 AND 21	3
36	3 AND 22	0
37	3 AND 23	0
38	3 AND 24	0
39	3 AND 25	0

40	3 AND 26	0
41	3 AND 27	0
42	3 AND 28	0
43	3 AND 29	1
44	3 AND 30	0
45	3 AND 31	0
46	SCANNER AND 28	197
47	SCANNER AND 29	75
48	SCANNER AND 30	7
49	SCANNER AND 31	6
50	SCANNER AND 18	59
51	SCANNER AND 19	12
52	SCANNER AND 20	2
53	SCANNER AND 21	24
54	SCANNER AND 22	2
55	SCANNER AND 23	0
56	SCANNER AND 24	0
57	SCANNER AND 25	1
58	SCANNER AND 26	4
59	SCANNER AND 27	3

**Google Patents: <https://patents.google.com>**

#	Search query	Results
1	"lateral magnification" lens image	8075
2	magnification of different areas of an image	2314848
3	scanner magnification of different areas of an image	909796
4	positive magnification scanner	591394
5	"positive magnification" scanner	120
6	"static FOV"	12
7	"FOV" scanner grocery	181
8	static "FOV" scanner grocery	53
9	"fixed FOV" scanner grocery	10
10	static bar code readers	77956

11	camera barrel distortion	38436
12	camera barrel distortion 30%	2670

**Computer Accessed Text Databases Searched**

The Patent Analyst searched the following computer accessed text databases:

Google: <https://www.google.com/>

#	Search query	Results
1	zoom lens having two afocal magnification varying units	50700
2	magnification of different areas of an image	21400000
3	positive magnification scanner	614
4	"static FOV"	3610
4	static "FOV" scanner grocery	10600
5	static "FOV" scanner	273000
6	camera barrel distortion	1550000
7	scanner lens magnification positive base housing "movable lens"	3110
8	scanner lens magnification positive base housing "movable lens" "lens holder"	236

Date search was completed: 12 December 2018

RM/CC