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SUPPLEMENTARY EUROPEAN SEARCH REPORT

Application number:
EP 19 85 63 38

Classification of the application (IPC):

A61K 31/417, A61K 9/00, A61K 9/08, A61K 31/407, A61K 31/573, A61K 47/44, A61K, A61P
A61K 47/26, A61K 47/10, A61K 47/12, A61K 47/18, A61K 47/32, A61K 31/137,
A61K 31/498, A61K 38/13, A61K 31/4725, A61K 31/56, A61K 31/436,
A61K 9/107, A61P 27/02

Technical fields searched (IPC):

DOCUMENTS CONSIDERED TO BE RELEVANT		
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim
Y	EP 1827373 B1 (NOVAGALI PHARMA SA [FR]) 03 December 2008 (2008-12-03) * paragraph [0036]; compound epinephrine * * paragraphs [0066] - [0067]; claims 1,25 * * claims 1,19,20 *	1, 2, 9, 15
X	US 9597328 B2 (UNIV ILLINOIS [US]; OCUGEN INC [US]) 21 March 2017 (2017-03-21) * column 6, line 59 - line 65 * * column 9, line 31 - line 52; claim 1 *	1-3, 15
Y	US 2007225217 A1 (CHAPPELL TODD W [US] ET AL) 27 September 2007 (2007-09-27) * paragraph [0136]; claim 12 * * paragraph [0263]; compounds epinephrine, levalbuterol *	1, 2, 9, 15
Y	US 2018055943 A1 (SALZMAN IRA JASON [US]) 01 March 2018 (2018-03-01) * paragraphs [0034], [0092]; compounds epinephrine, isoproterenol, salbutamol *	1, 2, 9, 15
Y	WO 2018139991 A1 (MACREGEN INC [US]) 02 August 2018 (2018-08-02) * paragraphs [0132], [0243]; compounds isoprenaline, levalbuterol, salbutamol *	1, 2, 9, 15
Y	US 9034830 B2 (NANDURI PADMA [US]; DYER T AARON [US]; INTRATUS INC [US]) 19 May 2015 (2015-05-19) * column 10, line 49 - line 51; claim 1; compounds dopexamine, epinephrine, isoprenaline *	1, 2, 9, 15

The supplementary search report has been based on the last set of claims valid and available at the start of the search.

Place of search The Hague	Date of completion of the search 07 September 2022	Examiner Cetinkaya, Murat
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CATEGORY OF CITED DOCUMENTS

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| Y: particularly relevant if combined with another document of the same category | T: theory or principle underlying the invention |
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DOCUMENTS CONSIDERED TO BE RELEVANT

Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim
X	US 2018221278 A1 (ARUMUGHAM RASAPPA [US] ET AL) 09 August 2018 (2018-08-09) * paragraph [0041] * * paragraphs [0081] - [0082]; claims 1,8; examples 5-6 *	1-3, 15
X	US 2018153885 A1 (JAIN SANDEEP [US] ET AL) 07 June 2018 (2018-06-07) * claims 1,10 * * paragraph [0031] *	1-3, 15
Y	US 2017304316 A1 (SHAH MANDAR V [IN] ET AL) 26 October 2017 (2017-10-26) * paragraph [0118] * * paragraphs [0141], [0142], [0144], [0145]; claim 1 *	1-3, 15
Y	AU 2012351948 A1 (ALLERGAN INC [US]) 10 July 2014 (2014-07-10) * page 6, line 4 - line 14 *	1-3, 15

The supplementary search report has been based on the last set of claims valid and available at the start of the search.

Place of search The Hague	Date of completion of the search 07 September 2022	Examiner Cetinkaya, Murat
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LACK OF UNITY OF INVENTION

The Search Division considers that the present European patent application does not comply with the requirements of unity of invention and relates to several inventions or groups of inventions, namely:

1. claims: 9(completely); 1, 2, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and a beta-adrenergic receptor agonist.
2. claims: 4(completely); 1-3, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and an immunosuppressant.
3. claims: 5(completely); 1-3, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and a lymphocyte associated antigen antagonist.
4. claims: 6-8, 13(completely); 1-3, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and an anti-inflammatory.
5. claims: 10(completely); 1-3, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and a beta-blocker.
6. claims: 11(completely); 1-3, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and a prostaglandin analog.
7. claims: 1, 2, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and a histamine receptor antagonist.
8. claims: 12(completely); 1-3, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and a carbonic anhydrase inhibitor.
9. claims: 1-3, 15(all partially)
Ophthalmic nanoemulsion formulation comprising an alpha 2 adrenergic agonist and an antibiotic.
10. claim: 14
An aqueous ophthalmic solution comprising brimonidine and cyclosporine.

Only part of the further search fees have been paid within the fixed time limit. The present (supplementary) European search report has been drawn up for those parts of the European patent application which relate to the inventions in respect of which search fees have been paid, namely claims: 1-3, 9, 15

The supplementary search report has been based on the last set of claims valid and available at the start of the search.

Place of search The Hague	Date of completion of the search 07 September 2022	Examiner Cetinkaya, Murat
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**ANNEX TO SUPPLEMENTARY EUROPEAN
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Patent document cited in search report		Publication date	Patent family member(s)	Publication date
EP 1827373	B1	03-12-2008	AU 2005304034 A1	18-05-2006
			AU 2005304035 A1	18-05-2006
			CA 2578176 A1	18-05-2006
			CA 2586074 A1	18-05-2006
			DK 1809238 T3	25-01-2010
			EP 1809237 A2	25-07-2007
			EP 1809238 A2	25-07-2007
			EP 1827373 A2	05-09-2007
			EP 1929996 A2	11-06-2008
			JP 5008571 B2	22-08-2012
			JP 5122969 B2	16-01-2013
			JP 2008518992 A	05-06-2008
			JP 2008518993 A	05-06-2008
			KR 20070083573 A	24-08-2007
			KR 20070084107 A	24-08-2007
			WO 2006050836 A2	18-05-2006
			WO 2006050837 A2	18-05-2006
			WO 2006050838 A2	18-05-2006
			US 9597328	B2
BR 112017017448 A2	03-04-2018			
CA 2976120 A1	01-09-2016			
CN 107427459 A	01-12-2017			
EP 3261620 A1	03-01-2018			
JP 2018506570 A	08-03-2018			
KR 20170132725 A	04-12-2017			
RU 2017129247 A	25-03-2019			
US 2016243116 A1	25-08-2016			
WO 2016138049 A1	01-09-2016			
US 2007225217	A1	27-09-2007		
			AU 2006311577 A1	18-05-2007
			BR PI0618643 A2	06-09-2011
			CA 2628570 A1	18-05-2007
			CN 101355876 A	28-01-2009
			EP 1956906 A2	20-08-2008
			EP 2218442 A1	18-08-2010
			HK 1128593 A1	06-11-2009
			IL 191283 A	31-03-2015
			JP 5490292 B2	14-05-2014
			JP 2009514969 A	09-04-2009
			JP 2013231047 A	14-11-2013
			KR 20080065704 A	14-07-2008
			NZ 568694 A	30-09-2011
			TW 200803887 A	16-01-2008


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The European Patent Office is in no way liable for these particulars which are merely given for the purpose of information.

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
		US 2007105761 A1	10-05-2007
		US 2007225217 A1	27-09-2007
		US 2012077756 A1	29-03-2012
		US 2012322746 A1	20-12-2012
		WO 2007056457 A2	18-05-2007
		ZA 200804550 B	26-08-2009
		ZA 200903604 B	27-06-2012
		ZA 201201391 B	30-07-2014
US 2018055943	A1	01-03-2018	NONE
WO 2018139991	A1	02-08-2018	CN 110545836 A EP 3554531 A1 JP 2020514407 A KR 20190124704 A WO 2018139991 A1
US 9034830	B2	19-05-2015	CY 1122417 T1 DK 2493474 T3 EP 2493474 A2 EP 2493475 A2 EP 3569223 A1 ES 2752008 T3 HR P20191828 T1 HU E046071 T2 LT 2493474 T PL 2493474 T3 PT 2493474 T SI 2493474 T1 US 2011104083 A1 US 2011104206 A1 US 2015174211 A1 WO 2011053792 A2 WO 2011053801 A2
US 2018221278	A1	09-08-2018	NONE
US 2018153885	A1	07-06-2018	NONE
US 2017304316	A1	26-10-2017	EP 3209331 A1 JP 6704400 B2 JP 2017531045 A US 2017304316 A1 WO 2016063184 A1



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Patent document cited in search report	Publication date	Patent family member(s)	Publication date	
AU 2012351948	A1	10-07-2014	AU 2012351948 A1	10-07-2014
			BR 112014014678 A2	13-06-2017
			CA 2859583 A1	20-06-2013
			CN 104114154 A	22-10-2014
			EP 2790673 A2	22-10-2014
			ES 2641621 T3	10-11-2017
			HK 1203148 A1	23-10-2015
			JP 6150079 B2	21-06-2017
			JP 2015500347 A	05-01-2015
			KR 20140103168 A	25-08-2014
			RU 2014129268 A	10-02-2016
			US 2013157963 A1	20-06-2013
			US 2014128329 A1	08-05-2014
			WO 2013090842 A2	20-06-2013