

101.429-12 – including *Taq* polymerase, IFU-01
101.429-12u – without *Taq* polymerase, IFU-02

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“Instructions for Use” (IFU)

Lot No.: **8E1**

Lot-specific Information

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Olerup SSP® HLA-A*30

Product number:	101.429-12 – including <i>Taq</i> polymerase 101.429-12u – without <i>Taq</i> polymerase
Lot number:	8E1
Expiry date:	2019-07-01
Number of tests:	12
Number of wells per test:	31+1
Storage - pre-aliquoted primers:	dark at -20°C
- PCR Master Mix:	-20°C
- Adhesive PCR seals	RT
- Product Insert	RT

This Product Description is only valid for Lot No. 8E1.

Complete product documentation consists of generic Instructions for Use (IFU), lot specific Product Insert, Worksheet and Certificate.

CHANGES COMPARED TO THE PREVIOUS OLERUP SSP® HLA-A*30 LOT (45Y)

The HLA-A*30 kit is updated for new alleles to enable separation of:

- Confirmed¹ alleles as listed in the IMGT/HLA database
- Polymorphisms in exons outside of the region encoding the peptide binding domain
- Null and Alternatively expressed alleles

¹As described in section Uniquely Identified Alleles.

The HLA-A*30 specificity and interpretation tables have been updated for the HLA-A alleles described since the previous Olerup SSP® HLA-A*30 lot was made (**Lot No. 45Y**). The kit design is based on IMGT/HLA database 3.26.0.

As of lot series V, the Specificity Table is included in the lot-specific Product Insert, and the Interpretation Table is included in the Worksheet.

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The primers of the wells detailed below have been exchanged, added or modified compared to the previous lot.

Well	5'-primer	3'-primer	rationale
8	Removed	Modified	5'-primer removed, 3'-primer modified for improved HLA-specific amplification.
16	Added	-	5'-primer added for the A*30:95 allele.
21	Added, Modified	-	5'-primer added for the A*30:100 allele, 5'-primer modified for improved HLA-specific amplification.
24	-	Added	3'-primer added for the A*30:90 allele.
25	Added	Added	Primer pair added for the A*30:95 allele.

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Well **32** contains Negative Control primer pairs, that will amplify more than 95% of the *Olerup SSP*® HLA Class I, DRB, DQB1, DPB1 and DQA1 amplicons as well as all the amplicons generated by the control primer pairs matching the human growth hormone gene.

HLA-specific PCR product sizes range from 75 to 200 base pairs.
The PCR product generated by the positive control primer pair is 430 base pairs.

Length of PCR product	105	200	105	80	75	80	85
5'-primer¹	164	340	440	45	45	43	36
	5'-CAC ^{3'}	5'-Agg ^{3'}	5'-TTA ^{3'}	5'-Tgg ^{3'}	5'-Tgg ^{3'}	5'-Tgg ^{3'}	5'-TAC ^{3'}
							36
							5'-TAT ^{3'}
3'-primer²	231	2nd I	507	59	58	57	47
	5'-TgC ^{3'}	5'-AAA ^{3'}	5'-TTg ^{3'}	5'-CTC ^{3'}	5'-ggC ^{3'}	5'-CTC ^{3'}	5'-ACA ^{3'}
							48
							5'-gCA ^{3'}
							48
							5'-gCC ^{3'}
							52
							5'-TgT ^{3'}
A*	+	+	+				
B*	+	+	+				
C*	+	+	+				
DRB1				+	+		
DRB3				+	+		
DRB5				+			
DQB1					+		
DPB1						+	
DQA1							+

¹The nucleotide position for HLA class I genes and the codon for HLA class II genes, in the 2nd or 3rd exon, matching the specificity-determining 3'-end of the primer is given. Nucleotide and codon numbering as on the www.ebi.ac.uk/imgt/hla web site. The sequence of the 3 terminal nucleotides of the primer is given.

²The nucleotide position for HLA class I genes and the codon for HLA class II genes, in the 2nd or 3rd exon or the 2nd intron, matching the specificity-determining 3'-end of the primer is given in the anti-sense direction. Nucleotide and codon numbering as on the www.ebi.ac.uk/imgt/hla web site. The sequence of the 3 terminal nucleotides of the primer is given.

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Lot-specific Information

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PRODUCT DESCRIPTION

HLA-A*30 SSP subtyping

CONTENT

The primer set contains 5'- and 3'-primers for identifying the A*30:01 to A*30:107 alleles.

PLATE LAYOUT

Each test consists of 32 PCR reactions in a 32 well cut PCR plate

1	2	3	4	5	6	7	8
9	10	11	12	13	14	15	16
17	18	19	20	21	22	23	24
25	26	27	28	29	30	31	NC

The 32 well cut PCR plate is marked with 'HLA-A*30' in silver/gray ink.

Well No. 1 is marked with '8E1'.

Wells 1 to 31 – HLA-A*30 high resolution primers.

Well 32 – Negative Control (NC).

A faint row of numbers is seen between wells 1 and 2 or wells 7 and 8 of the PCR trays. These stem from the manufacture of the trays, and should be disregarded.

The PCR plates are covered with a PCR-compatible foil.

Please note: When removing each 32 well PCR plate, make sure that the remaining plates stay covered. Use a scalpel or a similar instrument to carefully cut the foil between the plates.

INTERPRETATION

Due to the sharing of sequence motifs between HLA-A alleles non-HLA-A*30 alleles will be amplified by primer mixes 1, 3 to 5, 7, 9 to 12, 16, 17, 19, 20, 24, 25 and 27 to 29. In addition one HLA-B allele will be amplified by primer mix 28.

For further details see Specificity Table.

UNIQUELY IDENTIFIED ALLELES

All the HLA-A*30 alleles, i.e. **A*30:01 to A*30:107 alleles**, recognized by the HLA Nomenclature Committee in October 2016^{1,2} will be amplified by the primers in the HLA-A*30 subtyping kit.

The HLA-A*30 kit enables separation of the confirmed HLA-A*30 alleles as listed in the IMGT/HLA database. An HLA allele is listed as confirmed by IMGT/HLA if it has been sequenced by more than a single laboratory or from multiple sources. Current allele confirmation status for HLA-A*30 alleles is listed below.

The HLA-A*30 kit also enables identification of polymorphisms in exons outside of the region encoding the peptide binding domain and of null and alternatively expressed alleles.

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The following HLA-A*30 alleles can be distinguished by the different sizes of the HLA-specific PCR product:

Alleles	Primer mix
A*30:42, 30:81	26

The HLA-A*30 kit cannot distinguish silent mutations in the A*30:01:01-A*30:01:11 alleles, the 30:02:01:01-30:02:04, 30:02:06-30:02:11, 30:02:13 and 30:02:15-30:02:19, the A*30:04:01-30:04:02 or the A*30:11:01-30:11:02 alleles.

¹HLA-A alleles listed on the IMGT/HLA web page 2016-October-14, release 3.26.0, www.ebi.ac.uk/imgt/hla.

²Alleles that have been deleted from or renamed in the official WHO HLA Nomenclature up to and including the last IMGT/HLA database release can be retrieved from web page <http://hla.alleles.org/alleles/deleted.html>.

RESOLUTION IN HOMO- AND HETEROZYGOTES

Results file with resolution in HLA-A*30 homo- and heterozygotes is available upon request.

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ALLELE CONFIRMATION STATUS

Allele	Status ¹	Allele	Status ¹	Allele	Status ¹	Allele	Status ¹
A*30:01:01	Confirmed	A*30:11:02	Unconfirmed	A*30:52	Unconfirmed	A*30:92	Unconfirmed
A*30:01:02	Unconfirmed	A*30:12	Unconfirmed	A*30:53	Unconfirmed	A*30:93	Unconfirmed
A*30:01:03	Unconfirmed	A*30:13	Unconfirmed	A*30:54	Unconfirmed	A*30:94	Unconfirmed
A*30:01:04	Confirmed	A*30:14L	Unconfirmed	A*30:55	Unconfirmed	A*30:95	Unconfirmed
A*30:01:05	Unconfirmed	A*30:15	Unconfirmed	A*30:56	Confirmed	A*30:96	Unconfirmed
A*30:01:06	Unconfirmed	A*30:16	Confirmed	A*30:57	Unconfirmed	A*30:97	Unconfirmed
A*30:01:07	Unconfirmed	A*30:17	Confirmed	A*30:58	Unconfirmed	A*30:98	Unconfirmed
A*30:01:08	Unconfirmed	A*30:18	Unconfirmed	A*30:59N	Confirmed	A*30:99	Unconfirmed
A*30:01:09	Unconfirmed	A*30:19	Unconfirmed	A*30:60	Unconfirmed	A*30:100	Confirmed
A*30:01:10	Unconfirmed	A*30:20	Confirmed	A*30:61	Confirmed	A*30:102	Unconfirmed
A*30:01:11	Unconfirmed	A*30:22	Unconfirmed	A*30:62	Unconfirmed	A*30:103	Unconfirmed
A*30:02:01:01	Confirmed	A*30:23	Unconfirmed	A*30:63	Unconfirmed	A*30:104	Unconfirmed
A*30:02:01:02	Unconfirmed	A*30:24	Unconfirmed	A*30:64	Unconfirmed	A*30:106	Unconfirmed
A*30:02:01:03	Confirmed	A*30:25	Unconfirmed	A*30:65	Unconfirmed	A*30:107	Unconfirmed
A*30:02:02	Unconfirmed	A*30:26	Unconfirmed	A*30:66	Unconfirmed		
A*30:02:03	Confirmed	A*30:27N	Unconfirmed	A*30:67	Unconfirmed		
A*30:02:04	Confirmed	A*30:28	Unconfirmed	A*30:68	Unconfirmed		
A*30:02:05	Confirmed	A*30:29	Confirmed	A*30:69	Unconfirmed		
A*30:02:06	Confirmed	A*30:30	Confirmed	A*30:70N	Unconfirmed		
A*30:02:07	Unconfirmed	A*30:31	Confirmed	A*30:71	Confirmed		
A*30:02:08	Unconfirmed	A*30:32	Confirmed	A*30:72	Unconfirmed		
A*30:02:09	Unconfirmed	A*30:33	Unconfirmed	A*30:73N	Unconfirmed		
A*30:02:10	Unconfirmed	A*30:34	Unconfirmed	A*30:74	Unconfirmed		
A*30:02:11	Unconfirmed	A*30:35	Unconfirmed	A*30:75	Unconfirmed		
A*30:02:13	Confirmed	A*30:36	Confirmed	A*30:76N	Unconfirmed		
A*30:02:14	Unconfirmed	A*30:37	Unconfirmed	A*30:77	Unconfirmed		
A*30:02:15	Unconfirmed	A*30:38	Unconfirmed	A*30:78N	Confirmed		
A*30:02:16	Unconfirmed	A*30:39	Unconfirmed	A*30:79	Unconfirmed		
A*30:02:17	Unconfirmed	A*30:40	Confirmed	A*30:80	Confirmed		
A*30:02:18	Unconfirmed	A*30:41	Unconfirmed	A*30:81	Confirmed		
A*30:02:19	Unconfirmed	A*30:42	Confirmed	A*30:82	Unconfirmed		
A*30:03	Confirmed	A*30:43	Unconfirmed	A*30:83	Unconfirmed		
A*30:04:01	Confirmed	A*30:44	Unconfirmed	A*30:84	Unconfirmed		
A*30:04:02	Confirmed	A*30:45	Confirmed	A*30:85	Unconfirmed		
A*30:06	Unconfirmed	A*30:46	Unconfirmed	A*30:86	Unconfirmed		
A*30:07	Confirmed	A*30:47	Unconfirmed	A*30:87	Unconfirmed		
A*30:08	Confirmed	A*30:48	Unconfirmed	A*30:88	Unconfirmed		
A*30:09	Confirmed	A*30:49	Unconfirmed	A*30:89	Unconfirmed		
A*30:10	Confirmed	A*30:50	Unconfirmed	A*30:90	Confirmed		
A*30:11:01	Confirmed	A*30:51	Confirmed	A*30:91	Unconfirmed		

¹Allele status “confirmed” or “unconfirmed” as listed on the IMGT/HLA web page 2016-October-14, release 3.26.0, www.ebi.ac.uk/imgt/hla.

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SPECIFICITY TABLE

HLA-A*30 SSP subtyping

Specificities and sizes of the PCR products of the 31+1 primer mixes used for HLA-A*30 SSP subtyping

Primer Mix	Size of spec. PCR product ¹	Size of control band ²	Amplified HLA-A*30 alleles ³	Other amplified HLA-A alleles ⁴
1	165 bp	800 bp	*30:01:01-30:02:04, 30:02:06-30:02:11, 30:02:13-30:03, 30:07-30:16, 30:18-30:20, 30:22-30:25, 30:27N-30:28, 30:31-30:45, 30:47-30:76N, 30:78N-30:89, 30:91-30:92, 30:94-30:98, 30:100, 30:102, 30:104, 30:106-30:107	*02:52, 03:43, 03:186, 23:46
2	205 bp	800 bp	*30:01:01-30:01:11, 30:08, 30:11:01-30:11:02, 30:14L-30:16, 30:18-30:20, 30:23-30:24, 30:26, 30:30-30:31, 30:35-30:44, 30:48-30:49, 30:53-30:56, 30:58-30:60, 30:62-30:63, 30:65, 30:71-30:75, 30:78N-30:79, 30:81-30:83, 30:86-30:87, 30:91-30:98, 30:102, 30:104, 30:106	
3⁷	210 bp	800 bp	*30:02:01:01-30:02:11, 30:02:13-30:03, 30:07, 30:10, 30:12-30:13, 30:22, 30:25, 30:27N, 30:32-30:34, 30:45, 30:50-30:51, 30:57, 30:61, 30:64, 30:66-30:70N, 30:76N, 30:84-30:85, 30:88, 30:100, 30:107	*03:05:02, 03:231:01 ^w , 03:231:02, 11:24:01, 11:25:02, 34:02:02, 80:01:01:01-80:03
4⁶	155 bp	1070 bp	*30:03, 30:11:01-30:11:02, 30:71	*01:02, 01:20, 01:190, 33:108
5	150 bp	1070 bp	*30:04:01-30:04:02, 30:06, 30:17, 30:29, 30:46, 30:77, 30:90, 30:99, 30:103	*02:52, 03:82, 24:66, 24:308, 24:333, 68:06
6⁵	245 bp 80 bp 185 bp	1070 bp	*30:19 *30:06 *30:07	
7	200 bp	1070 bp	*30:02:14, 30:08, 30:28	*02:185 ^w , 02:601 ^w
8^{5,7}	85 bp	800 bp	*30:10, 30:88	
9	180 bp	1070 bp	*30:01:01-30:02:11, 30:02:13-30:02:19, 30:04:01-30:04:02, 30:06-30:07, 30:09-30:10, 30:12-30:20, 30:23-30:54, 30:56-30:70N, 30:72-30:78N, 30:80-30:84, 30:86-30:100, 30:102-30:104, 30:106-30:107	*24:124

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Lot No.	HLA-A*30	HLA-A*30	Lot-specific Information	www.olerup-ssp.com
10	150 bp	1070 bp	*30:12, 30:18, 30:55	*01:07, 02:185, 02:601, 24:124, 26:19, 29:14, 31:01:02:01-31:01:06, 31:01:08-31:07, 31:09-31:43, 31:45-31:86, 31:88, 31:90-31:115
11	215 bp	800 bp	*30:01:01-30:02:11, 30:02:13-30:04:02, 30:06, 30:09-30:20, 30:23-30:30, 30:32-30:54, 30:56-30:59N, 30:61-30:78N, 30:80-30:100, 30:102-30:104, 30:106-30:107	*01:02 ^w , 01:20 ^w , 03:72, 11:88, 23:09 ^w , 23:51, 24:24, 24:67, 24:129 ^w , 24:145, 24:156, 24:191, 24:290, 26:16, 29:37, 29:56, 32:07, 33:119, 68:45, 68:117
12 ⁶	190 bp	1070 bp	*30:09, 30:35	*03:42, 03:131, 03:133, 11:165, 31:03-31:04, 33:49, 74:23
13	160 bp	1070 bp	*30:01:01-30:02:11, 30:02:13-30:02:19, 30:04:01-30:04:02, 30:06-30:10, 30:13-30:17, 30:19-30:20, 30:23-30:40, 30:42-30:54, 30:56-30:70N, 30:72-30:84, 30:86-30:100, 30:102, 30:104, 30:106-30:107	
14 ⁶	210 bp	1070 bp	*30:13, 30:16, 30:44, 30:46	
15	245 bp	800 bp	*30:14L, 30:29	
16 ⁶	235 bp 265 bp	1070 bp	*30:95 *30:15, 30:33	*36:02, 36:04
17	225 bp	1070 bp	*30:01:01-30:01:11, 30:11:01-30:11:02, 30:14L-30:20, 30:23-30:24, 30:26, 30:30-30:31, 30:35-30:43, 30:48-30:49, 30:52-30:54, 30:56, 30:58-30:60, 30:62-30:63, 30:65, 30:72-30:75, 30:78N, 30:81-30:83, 30:86-30:87, 30:89, 30:91-30:98, 30:102, 30:104, 30:106	*03:72, 11:88, 24:19, 24:290, 29:37, 29:56, 68:45, 68:117
18	130 bp 210 bp	800 bp	*30:32 *30:20, 30:71	
19 ^{5,6}	125 bp 160 bp 200 bp 235 bp	1070 bp	*30:70N *30:22 *30:31 *30:77	*03:45
20	210 bp 275 bp	800 bp	*30:23 *30:34	*03:04:02-03:04:03, 11:153:01
21	150 bp 185 bp	1070 bp	*30:30, 30:100 *30:24	
22	180 bp 215 bp	800 bp	*30:36, 30:73N *30:27N	
23	150 bp	1070 bp	*30:26, 30:76N	
24 ^{5,8}	105 bp 210 bp	800 bp	*30:78N *30:25, 30:57, 30:88, 30:90	*01:02, 01:20, 01:190
25	160 bp 235 bp	1070 bp	*30:40, 30:76N *30:95	*36:02, 36:04
26 ⁵	80 bp 300 bp	1070 bp	*30:42 *30:81	

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27	145 bp 195 bp	1070 bp	*30:56 *30:45	*11:166
28	270 bp	1070 bp	*30:51, 30:106	*02:121, 02:425, 02:517, 03:154:01, 23:47, 24:234, 24:339, 29:06, 31:51, 68:14, B*15:401
29	130 bp	1070 bp	*30:59N, 30:61, 30:74	*01:57N, 02:156, 02:338, 03:17:01, 03:171, 11:119:01- 11:119:02, 11:209, 24:92, 68:103:01-68:103:02
	190 bp		*30:73N	
30⁵	80 bp	1070 bp	*30:37	
31	210 bp	1070 bp	*30:80	
32⁹	-	-	Negative Control	

¹Alleles are assigned by the presence of specific PCR product(s). However, the sizes of the specific PCR products may be helpful in the interpretation of HLA-A*30 SSP typings.

When the primers in a primer mix can give rise to HLA-specific PCR products of more than one length this is indicated if the size difference is more than 20 base pairs. Size differences of 20 base pairs or less are not given. For high resolution SSP kits, the alleles listed are specified according to amplicon length.

Nonspecific amplifications, i.e. a ladder or a smear of bands, may sometimes be seen. GC-rich primers have a higher tendency of giving rise to nonspecific amplifications than other primers.

PCR fragments longer than the control bands may sometimes be observed. Such bands should be disregarded and do not influence the interpretation of the SSP typings.

PCR fragments migrating faster than the control bands, but slower than a 400 bp fragment may be seen in some gel read-outs. Such bands can be disregarded and do not influence the interpretation of the SSP typings.

Some primers may give rise to primer oligomer artifacts. Sometimes this phenomenon is an inherent feature of the primer pair(s) of a primer mix. More often it is due to other factors such as too low amount of DNA in the PCR reactions, taking too long time in setting up the PCR reactions, working at elevated room temperature or using thermal cyclers that are not pre-heated.

²The internal positive control primer pairs amplify segments of the human growth hormone gene. The internal positive control bands are 1070 or 800 base pairs respectively, well distribution as outlined in the table. Well number 1 contains the shorter, 800 bp, internal positive control band. The well distribution of the internal controls can help in orientation of the kit on gel photo, as well as allow for kit identification. In the presence of a specific amplification the intensity of the control band often decreases.

³For several HLA Class I alleles 1st and/or 4th exon(s) and beyond, as well as intron nucleotide sequences, are not available. In these instances it is not known whether some of the primers of the SSP sets are completely matched with the target sequences or not. Assumption is made that unknown sequences in these regions are conserved within allelic groups.

⁴Due to the sharing of sequence motifs between HLA-A alleles non-HLA-A*30 alleles will be amplified by primer mixes 1, 3 to 5, 7, 9 to 12, 16, 17, 19, 20, 24, 25 and 27 to 29. In addition one HLA-B allele will be amplified by primer mix 28.

⁵HLA-specific PCR products shorter than 125 base pairs have a lower intensity and are less sharp than longer PCR products.

⁶Primer mixes 4, 12, 14, 16 and 19 may give rise to unspecific amplifications.

⁷Primer mixes 3 and 8 may give rise to a lower yield of HLA-specific PCR product than the other A*30 primer mixes.

⁸Primer mix 24 may have a tendency of giving rise to primer oligomer formation.

⁹Primer mix 32 contains a negative control, which will amplify more than 95% of HLA amplicons as well as the amplicons generated by the control primer pairs matching the human growth hormone gene. HLA-specific PCR product sizes range from 75 to 200 base pairs and the PCR product generated by the HGH positive control primer pair is 430 base pairs.

'w', might be weakly amplified.

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PRIMER SPECIFICATION

Well No.	1	2	3	4	5	6	7	8	9	10	11	12
Length of spec. PCR product	165	205	210	155	150	80	200	85	180	150	215	190
Length of int. pos. control ¹	800	800	800	1070	1070	1070	1070	800	1070	1070	800	1070
5'-primer(s) ²	414 5'-gAA 3'	363 5'-ATA 3'	363 5'-ATA 3'	123 5'-AgT 3'	123 5'-AgT 3'	123 5'-AgT 3'	78 5'-TCT 3'	367 5'-TgC 3'	98 5'-CTC 3'	127 5'-ggg 3'	98 5'-CTC 3'	363 5'-ATA 3'
					414 5'-gAA 3'		362 5'-ggT 3'					
3'-primer(s) ³	538 5'-CAA 3'	526 5'-CCA 3'	526 5'-CCg 3'	238 5'-CCC 3'	325 5'-gTg 3'	163 5'-CgC 3'	238 5'-CCT 3'	411 5'-TCA 3'	238 5'-CCT 3'	238 5'-CCT 3'	270 5'-ACA 3'	505 5'-gCT 3'
			535 5'-CTA 3'		524 5'-CAT 3'	265 5'-CCC 3'	526 5'-CCg 3'					524 5'-CAC 3'
			538 5'-CAg 3'									
Well No.	1	2	3	4	5	6	7	8	9	10	11	12

Well No.	13	14	15	16	17	18	19	20	21	22	23	24
Length of spec. PCR product	160	210	245	235	225	130	125	210	150	180	150	105
				265			210	160	275	185	215	210
							200					
							235					
Length of int. pos. control ¹	1070	1070	800	1070	1070	800	1070	800	1070	800	1070	800
5'-primer(s) ²	117 5'-CCT 3'	123 5'-AgT 3'	363 5'-ATA 3'	363 5'-ATA 3'	98 5'-CTC 3'	123 5'-AgT 3'	123 5'-AgT 3'	363 5'-ATA 3'	410 5'-gTg 3'	363 5'-ATA 3'	127 5'-gAT 3'	123 5'-AgT 3'
	123 5'-AgT 3'			784 5'-ggA 3'			650 5'-CCC 3'		634 5'-CAg 3'		413 5'-CCg 3'	
				808 5'-CgT 3'					680 5'-gTT 3'			
3'-primer(s) ³	238 5'-CCT 3'	292 5'-gTg 3'	563 5'-Cgg 3'	586 5'-CAC 3'	282 5'-gAC 3'	212 5'-gCC 3'	206 5'-CA 3'	530 5'-CCT 3'	526 5'-CCA 3'	494 5'-TCC 3'	238 5'-CCT 3'	187 5'-g.C 3'
			572 5'-gCg 3'	899 5'-ACA 3'		289 5'-AgC 3'	240 5'-ggA 3'	595 5'-CCT 3'	777 5'-gCA 3'	513 5'-TCC 3'	526 5'-CCA 3'	282 5'-gAC 3'
						294 5'-CgT 3'	281 5'-ACC 3'			535 5'-CTA 3'		299 5'-TCg 3'
							845 5'-AgT 3'					
Well No.	13	14	15	16	17	18	19	20	21	22	23	24

101.429-12 – including *Taq* polymerase, IFU-01
101.429-12u – without *Taq* polymerase, IFU-02

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Lot No.: **8E1**

Lot-specific Information

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Well No.	25	26	27	28	29	30	31
Length of spec. PCR product	160 235	80 300	145 195	270	130 190	80	210
Length of int. pos. control ¹	1070	1070	1070	1070	1070	1070	1070
5'-primer(s) ²	127 5'-gAT 3'	363 5'-ATA 3'	176 5'-gCA 3'	385 5'-ggT 3'	363 5'-ATA 3'	485 5'-CAC 3'	355 5'-CCC 3'
	397 5'-gCC 3'	627 5'-CCC 3'	414 5'-gAA 3'				
	808 5'-CgT 3'						
3'-primer(s) ³	238 5'-CCT 3'	403 5'-gCT 3'	282 5'-gAC 3'	616 5'-CgC 3'	453 5'-TCT 3'	526 5'-CCA 3'	526 5'-CCg 3'
	526 5'-CCA 3'	886 5'-CAT 3'	570 5'-CAg 3'		454 5'-CTA 3'		
	899 5'-ACA 3'				513 5'-TCC 3'		
Well No.	25	26	27	28	29	30	31

¹The internal positive control primer pairs amplify segments of the human growth hormone gene. The internal positive control bands are 1070 or 800 base pairs respectively, well distribution as outlined in the table. Well number 1 contains the shorter, 800 bp, internal positive control band. The well distribution of the internal controls can help in orientation of the kit on gel photo, as well as allow for kit identification. In the presence of a specific amplification the intensity of the control band often decreases.

²The nucleotide position matching the specificity-determining 3'-end of the primer is given. Nucleotide numbering as on the www.ebi.ac.uk/imgt/hla web site. The sequence of the 3 terminal nucleotides of the primer is given.

³The nucleotide position matching the specificity-determining 3'-end of the primer is given in the anti-sense direction. Nucleotide numbering as on the www.ebi.ac.uk/imgt/hla web site. The sequence of the 3 terminal nucleotides of the primer is given.

101.429-12 – including *Taq* polymerase, IFU-01
101.429-12u – without *Taq* polymerase, IFU-02

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Lot No.: **8E1**

Lot-specific Information

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CELL LINE VALIDATION SHEET																				
HLA-A*30 SSP subtyping kit ²																				
				Prod. No.:	Well															
					1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
					201206201	201206202	201206203	201206204	201206205	201206206	201206207	201676408	201206209	201206210	201206211	201206212	201552613	201206214	201206215	201676416
	IHWC cell line ¹	A*	A*																	
1	9001 SA	*24:02			-	-	-	-	-	-	-	-	-	-	-	-	-			
2	9280 LK707	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
3	9011 E4181324	*01:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
4	9275 GU373	*30:01			+	+	-	-	-	-	-	-	-	-	-	-	-			
5	9009 KAS011	*01:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
6	9353 SM	*02:01	*26:03		-	-	-	-	-	-	-	-	-	-	-	-	-			
7	9020 QBL	*26:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
8	9025 DEU	*31:01			-	-	-	-	-	-	-	+	-	-	-	-	-			
9	9026 YAR	*26:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
10	9107 LKT3	*24:02			-	-	-	-	-	-	-	-	-	-	-	-	-			
11	9051 PITOUT	*29:02			-	-	-	-	-	-	-	-	-	-	-	-	-			
12	9052 DBB	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
13	9004 JESTHOM	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
14	9071 OLGA	*31:01			-	-	-	-	-	-	-	+	-	-	-	-	-			
15	9075 DKB	*24:02			-	-	-	-	-	-	-	-	-	-	-	-	-			
16	9037 SWEIG007	*29:02			-	-	-	-	-	-	-	-	-	-	-	-	-			
17	9282 CTM3953540	*03:01	*80:01		-	-	+	-	-	-	-	-	-	-	-	-	-			
18	9257 32367	*33:03	*74:01		-	-	-	-	-	-	-	-	-	-	-	-	-			
19	9038 BM16	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
20	9059 SLE005	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
21	9064 AMALA	*02:17			-	-	-	-	-	-	-	-	-	-	-	-	-			
22	9056 KOSE	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
23	9124 IHL	*02:01	*34:01		-	-	-	-	-	-	-	-	-	-	-	-	-			
24	9035 JBUSH	*32:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
25	9049 IBW9	*33:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
26	9285 WT49	*02:05			-	-	-	-	-	-	-	-	-	-	-	-	-			
27	9191 CH1007	*24:10	*29:01		-	-	-	-	-	-	-	-	-	-	-	-	-			
28	9320 BEL5GB	*02:01	*29:02		-	-	-	-	-	-	-	-	-	-	-	-	-			
29	9050 MOU	*29:02			-	-	-	-	-	-	-	-	-	-	-	-	-			
30	9021 RSH	*30:01	*68:02		+	+	-	-	-	-	-	+	-	+	-	+	-			
31	9019 DUCAF	*30:02			+	-	+	-	-	-	-	+	-	+	-	+	-			
32	9297 HAG	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
33	9098 MT14B	*31:01			-	-	-	-	-	-	-	+	-	-	-	-	-			
34	9104 DHIF	*31:01			-	-	-	-	-	-	-	+	-	-	-	-	-			
35	9302 SSTO	*32:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
36	9024 KT17	*02:06	*11:01		-	-	-	-	-	-	-	-	-	-	-	-	-			
37	9065 HHKB	*03:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
38	9099 LZL	*02:17			-	-	-	-	-	-	-	-	-	-	-	-	-			
39	9315 CML	*01:01	*03:01		-	-	-	-	-	-	-	-	-	-	-	-	-			
40	9134 WHONP199	*02:07	*30:01		+	+	-	-	-	-	-	+	-	+	-	+	-			
41	9055 H0301	*03:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
42	9066 TAB089	*02:07			-	-	-	-	-	-	-	-	-	-	-	-	-			
43	9076 T7526	*02:06	*02:07		-	-	-	-	-	-	-	-	-	-	-	-	-			
44	9057 TEM	*66:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
45	9239 SHJO	*23:01	*24:02		-	-	-	-	-	-	-	-	-	-	-	-	-			
46	9013 SCHU	*03:01			-	-	-	-	-	-	-	-	-	-	-	-	-			
47	9045 TUBO	*02:16	*03:01		-	-	-	-	-	-	-	-	-	-	-	-	-			
48	9303 TER-ND	*02:01	*11:01		-	-	-	-	-	-	-	-	-	-	-	-	-			

101.429-12 – including *Taq* polymerase, IFU-01
101.429-12u – without *Taq* polymerase, IFU-02

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“Instructions for Use” (IFU)

Lot No.: **8E1**

Lot-specific Information

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CELL LINE VALIDATION SHEET																				
HLA-A*30 SSP subtyping kit ²																				
					Well															
					17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	
					Prod. No.:	201206217	201430918	201430919	201206220	201676421	201552622	201552623	201676424	201676425	201552626	201430927	201206228	201430929	201206230	201552631
	IHWC cell line ¹	A*	A*																	
1	9001 SA	*24:02			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	9280 LK707	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
3	9011 E4181324	*01:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4	9275 GU373	*30:01			+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
5	9009 KAS011	*01:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
6	9353 SM	*02:01	*26:03		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
7	9020 QBL	*26:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
8	9025 DEU	*31:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
9	9026 YAR	*26:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
10	9107 LKT3	*24:02			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
11	9051 PITOUT	*29:02			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
12	9052 DBB	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	9004 JESTHOM	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
14	9071 OLGA	*31:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
15	9075 DKB	*24:02			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
16	9037 SWEIG007	*29:02			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
17	9282 CTM3953540	*03:01	*80:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
18	9257 32367	*33:03	*74:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
19	9038 BM16	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
20	9059 SLE005	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
21	9064 AMALA	*02:17			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
22	9056 KOSE	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
23	9124 IHL	*02:01	*34:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
24	9035 JBUSH	*32:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
25	9049 IBW9	*33:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
26	9285 WT49	*02:05			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
27	9191 CH1007	*24:10	*29:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
28	9320 BEL5GB	*02:01	*29:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
29	9050 MOU	*29:02			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
30	9021 RSH	*30:01	*68:02		+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
31	9019 DUCAF	*30:02			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
32	9297 HAG	*02:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
33	9098 MT14B	*31:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
34	9104 DHIF	*31:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
35	9302 SSTO	*32:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
36	9024 KT17	*02:06	*11:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
37	9065 HHKB	*03:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
38	9099 LZL	*02:17			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
39	9315 CML	*01:01	*03:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
40	9134 WHONP199	*02:07	*30:01		+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
41	9055 H0301	*03:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
42	9066 TAB089	*02:07			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
43	9076 T7526	*02:06	*02:07		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
44	9057 TEM	*66:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
45	9239 SHJO	*23:01	*24:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
46	9013 SCHU	*03:01			-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
47	9045 TUBO	*02:16	*03:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
48	9303 TER-ND	*02:01	*11:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

101.429-12 – including *Taq* polymerase, IFU-01
101.429-12u – without *Taq* polymerase, IFU-02

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Lot No.: **8E1**

Lot-specific Information

www.olerup-ssp.com

¹The provided cell line HLA specificities are retrieved from the <http://www.ihwg.org/hla> web site. The specificity of an individual cell line may thus be subject to change.

²The specificity of each primer solution in the kit has been tested against 48 well characterized cell line DNAs and where applicable, additional cell line DNAs.

No DNAs carrying the alleles to be amplified by primer solutions 6, 7, 14 to 16 and 18 to 31 were available. The specificities of the primers in primer 6, 7, 14 to 16, 19, 23, 24, 25, 27, 29, 30 and 31 were tested by separately adding one, two or three additional 5'-primers, respectively one or two additional 3'-primers. In primer solutions 18, 20, 22, 26 and 28 it was only possible to test the 5'-primer, the 3'-primers were not possible to test. In primer solution 21 it was only possible to test the 3'-primers, the 5'-primers were not possible to test.

In primer solutions 7, 16, 23 and 25 one or two 5'-primers were not possible to test, and in primer solutions 2, 3, 5, 6, 12, 15, 16, 19, 24, 27 and 29 one, two or three 3'-primers were not possible to test.

In addition, one 5'-primer in primer solutions 5 and 13 were tested by adding an additional 3'-primer.

101.429-12 – including *Taq* polymerase, IFU-01
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101.429-12 – including *Taq* polymerase, IFU-01
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Lot No.: **8E1**

Lot-specific Information

www.olerup-ssp.com

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Fax: +43-1-710 15 00 10

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Web page: <http://www.olerup.com>

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