

101.541-06 – including *Taq* polymerase
101.541-06u – without *Taq* polymerase

Visit www.caredx.com for
“Instructions for Use” (IFU)

Lot No.: **3S8**

Lot-specific information
***Olerup SSP®* HLA-B*37**

Product number:	101.541-06 – including <i>Taq</i> polymerase 101.541-06u – without <i>Taq</i> polymerase
Lot number:	3S8
Expiry date:	2027-09-01
Number of tests:	6
Number of wells per test:	30+1
Storage - pre-aliquoted primers:	dark, between -15°C and -25°C
- PCR Master Mix:	between -15°C and -25°C
- Adhesive PCR seals	RT

This Product Description is only valid for Lot No. 3S8.

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-B*37 LOT (5N1).**

- The product documentation has been updated for new alleles of IMGT 3.53.0.
- The kit resolution focuses on common and well documented (CWD) alleles¹.

¹As described in section Uniquely Identified Alleles.

The HLA-B*37 primer set, specificity and interpretation tables have been updated for the HLA-B alleles described since the previous *Olerup SSP®* HLA-B*37 lot was made (**Lot No. 5N1**).

The HLA-B*37 primer set is unchanged compared to the previous *Olerup SSP®* HLA-B*37 lot (**Lot No. 5N1**).

¹S. J. Mack, P. Cano, J. A. Hollenbach et al.
Common and well-documented HLA alleles: 2012 update to
the CWD catalogue. Tissue Antigens, 2013, 81, 194–203

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Well **31** contains Negative Control primer pairs, that will amplify the majority 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 200 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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PRODUCT DESCRIPTION

HLA-B*37 SSP typing

CONTENT

The primer set contains 5'- and 3'-primers for identifying the B*37:01 to B*37:108 alleles.

PLATE LAYOUT

Each HLA-B*37 test consists of 31 PCR reactions in a 32 well cut PCR plate. Well 32 is empty.

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	NC	empty

The 32 well PCR plate is marked with ‘HLA-B*37’ in silver/gray ink.

Well No. 1 is marked with the Lot No. ‘3S8’.

Wells 1 to 30 – HLA-B*37 high resolution primers.

Well 31 – 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 heat-sealed with a PCR-compatible foil.

Please note: When removing each 32 well PCR plate, make sure that the remaining plates stay sealed. 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-B alleles, non-HLA-B*37 alleles will be amplified by some primer mixes. For further details see Specificity Table.

UNIQUELY IDENTIFIED ALLELES

All the HLA-B*37, i.e. **B*37:01 to B*37:108**, recognized by the HLA Nomenclature Committee in July 2023^{1,2} will be amplified by the primers in the HLA-B*37 SSP kit.

The HLA-B*37 kit enables separation of the confirmed HLA-B*37 alleles as listed in the IMGT/HLA database 3.29.0. 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-B*37 alleles is listed below.

The following alleles will give rise to identical amplification patterns with the HLA-B*37 subtyping kit. These alleles can be distinguished by the HLA-B low resolution kit and/or the HLA-B*18 subtyping kit:



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Lot-specific information

Alleles

B*37:40, 37:44, 37:66, 37:83, 37:94, B*18:195

The following HLA-B*37 alleles can be distinguished by the different sizes of the HLA-specific PCR product:

Alleles	Primer mix
B*37:24, 37:27	21
B*37:26, 37:46	10

¹HLA-B alleles listed on the IMGT/HLA web page 2023-July-12, release 3.53.0, 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>.

ALLELE CONFIRMATION STATUS

Allele	Status ¹	Allele	Status ¹	Allele	Status ¹
B*37:01:01	Confirmed	B*37:19:01	Unconfirmed	B*37:48	Confirmed
B*37:01:02	Confirmed	B*37:19:02	Unconfirmed	B*37:49	Unconfirmed
B*37:01:03	Confirmed	B*37:20	Unconfirmed	B*37:50	Unconfirmed
B*37:01:04	Unconfirmed	B*37:21	Confirmed	B*37:51	Unconfirmed
B*37:01:05	Unconfirmed	B*37:22	Confirmed	B*37:52	Confirmed
B*37:01:06	Unconfirmed	B*37:23	Unconfirmed	B*37:53	Unconfirmed
B*37:01:07	Confirmed	B*37:24	Unconfirmed	B*37:54	Unconfirmed
B*37:01:08	Unconfirmed	B*37:25	Unconfirmed	B*37:55	Unconfirmed
B*37:01:09	Confirmed	B*37:26	Unconfirmed	B*37:56	Unconfirmed
B*37:01:10	Unconfirmed	B*37:27	Unconfirmed	B*37:57	Unconfirmed
B*37:01:11	Unconfirmed	B*37:28	Unconfirmed	B*37:58	Confirmed
B*37:02	Unconfirmed	B*37:29	Unconfirmed	B*37:59	Unconfirmed
B*37:03N	Confirmed	B*37:30N	Unconfirmed	B*37:60	Unconfirmed
B*37:04:01	Confirmed	B*37:31	Unconfirmed	B*37:61	Unconfirmed
B*37:04:02	Confirmed	B*37:32	Unconfirmed	B*37:62	Unconfirmed
B*37:05	Unconfirmed	B*37:33N	Unconfirmed	B*37:63	Unconfirmed
B*37:06:01	Confirmed	B*37:34	Unconfirmed	B*37:64	Unconfirmed
B*37:06:02	Unconfirmed	B*37:35	Confirmed	B*37:65	Unconfirmed
B*37:07	Confirmed	B*37:36	Unconfirmed	B*37:66	Unconfirmed
B*37:08	Unconfirmed	B*37:37	Unconfirmed	B*37:67	Unconfirmed
B*37:09	Unconfirmed	B*37:38	Unconfirmed	B*37:68	Unconfirmed
B*37:10	Confirmed	B*37:39	Unconfirmed		
B*37:11	Unconfirmed	B*37:40	Unconfirmed		
B*37:12	Unconfirmed	B*37:41	Unconfirmed		
B*37:13	Unconfirmed	B*37:42N	Confirmed		
B*37:14	Unconfirmed	B*37:43	Unconfirmed		
B*37:15	Unconfirmed	B*37:44	Unconfirmed		
B*37:16Q	Unconfirmed	B*37:45	Unconfirmed		
B*37:17	Confirmed	B*37:46	Unconfirmed		
B*37:18	Confirmed	B*37:47	Unconfirmed		

¹Allele status “confirmed” or “unconfirmed” as listed on the IMGT/HLA web page 2017-August-10, release 3.29.0, www.ebi.ac.uk/imgt/hla.

RESOLUTION IN HOMO- AND HETEROZYGOTES

Results file with resolution in HLA-B*37 homo- and heterozygotes is available upon request.



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Lot-specific information

SPECIFICITY TABLE

HLA-B*37 SSP subtyping

Specificities and sizes of the PCR products of the 30+1 primer mixes used for
HLA-B*37 SSP subtyping

Primer Mix	Size of spec. PCR product ¹	Size of control band ²	Amplified HLA-B*37 alleles ³	Other amplified HLA-B alleles
1	210 bp	800 bp	*37:01:01:01-37:01:31, 37:03N-37:06:02, 37:08, 37:10-37:11, 37:13- 37:18, 37:20-37:38, 37:41-37:43, 37:45- 37:55, 37:57-37:65, 37:67-37:82N, 37:84- 37:93, 37:95-37:96, 37:98-37:108	*08:49, C*07:68, C*07:302, C*07:929, C*07:941
2⁴	95 bp	800 bp	*37:02	*07:197, 15:342, 18:165, 27:01-27:05:15, 27:05:17-27:05:37, 27:05:39-27:05:59, 27:08, 27:10, 27:12:01:01-27:13:02, 27:15- 27:18, 27:23, 27:25-27:26, 27:28-27:29, 27:31, 27:36-27:40, 27:42, 27:44-27:45, 27:47-27:69, 27:71-27:75, 27:77, 27:79- 27:80, 27:82-27:90:04, 27:92-27:101, 27:103-27:105, 27:108-27:124, 27:126, 27:128-27:129, 27:131-27:135, 27:137, 27:139-27:149, 27:151-27:152, 27:155- 27:163, 27:165-27:167, 27:169-27:179, 27:181-27:186, 27:188-27:191, 27:193- 27:207, 27:209-27:214, 27:216-27:217, 27:220-27:221, 27:223N-27:232, 27:234- 27:250, 27:252-27:261N, 27:263N-27:267, 40:429, 47:04-47:05, 48:26, A*32:89 *07:27, 07:236, 08:126, 08:131, 08:139, 27:03, 27:05:02:01-27:05:20, 27:05:22- 27:05:59, 27:07:01-27:07:06, 27:09-27:10, 27:13:01-27:14, 27:16-27:17, 27:19:01:01- 27:19:01:02, 27:27-27:29, 27:32, 27:34- 27:35, 27:37-27:39, 27:41, 27:43, 27:45- 27:48, 27:50:01-27:51, 27:54-27:56, 27:58- 27:60, 27:64N, 27:70-27:74, 27:76, 27:78, 27:80-27:82, 27:84-27:85, 27:87-27:88, 27:90:01-27:90:04, 27:92-27:94N, 27:96:01-27:99, 27:101, 27:104, 27:111, 27:116-27:118, 27:121-27:124, 27:127- 27:130, 27:132-27:133, 27:135-27:137, 27:139-27:141, 27:143-27:146, 27:148, 27:150-27:152, 27:155, 27:159-27:162, 27:164, 27:166-27:167, 27:169-27:170, 27:174-27:175, 27:177-27:180, 27:182, 27:184-27:187, 27:189-27:191,
	135 bp		*37:28	



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				27:193-27:196, 27:199-27:201, 27:205-27:207, 27:209, 27:212N, 27:216-27:221, 27:223N-27:225N, 27:227-27:228, 27:230-27:231, 27:233-27:235, 27:237-27:239, 27:241, 27:243N-27:244, 27:248-27:250, 27:252-27:256, 27:258-27:261N, 27:263N-27:266, 38:17, 55:90, 55:121
3	200 bp 235 bp	1070 bp	*37:13 *37:03N	*07:446N
4	200 bp 240 bp	1070 bp	*37:13 *37:04:01-37:04:02, 37:39, 37:48, 37:97	*15:32:01-15:32:02, 15:299, 15:583, 18:18:01:01-18:18:01:02, 18:204, 35:48, 35:433, 44:209, 53:07, 53:65, 58:121, C*03:90, C*03:103, C*03:178, C*03:300, C*03:474, C*07:03, C*07:186, C*07:242, C*07:265, C*07:516, C*07:748
5	210 bp	1070 bp	*37:01:01:01-37:04:02, 37:06:01-37:09, 37:12- 37:13, 37:15-37:21, 37:23-37:33N, 37:35- 37:36, 37:38-37:66, 37:68-37:94, 37:96- 37:108	*07:27, 07:236, 07:273, 08:126, 18:54, 18:195, 38:17
6	145 bp	1070 bp	*37:05, 37:11, 37:14 ^w , 37:37, 37:67	*07:65, 07:133-07:134, 07:400, 08:32, 08:133, 08:155, 08:180, 08:239, 15:46, 15:53, 15:106, 15:143, 15:202, 15:212, 15:239, 15:308, 15:376, 15:525, 18:01:01:01-18:03:01:03, 18:04:01-18:08, 18:10-18:15, 18:17N-18:36, 18:38-18:53, 18:55-18:65, 18:68-18:124, 18:126- 18:135:01:02, 18:137-18:177, 18:180- 18:193, 18:196-18:232, 35:01:01:01- 35:01:38, 35:01:40-35:02:08, 35:02:10- 35:08:01:13, 35:08:03-35:08:04, 35:08:06- 35:24:02, 35:27-35:43:01, 35:43:03-35:45, 35:47-35:48, 35:50-35:72, 35:74-35:197, 35:199-35:206, 35:208:01-35:209, 35:211- 35:221, 35:223-35:247:02, 35:249-35:253, 35:255-35:270, 35:272-35:292, 35:294- 35:310, 35:312-35:328, 35:330-35:360, 35:362-35:423, 35:425-35:470, 35:472- 35:521, 35:523-35:524, 35:526-35:569, 35:571-35:582, 35:584-35:586, 39:19:01- 39:19:02, 39:69, 39:186, 40:01:01- 40:11:02, 40:14:01-40:16:01:02, 40:18, 40:20:01:01-40:20:01:02, 40:22N-40:40, 40:42-40:45, 40:48-40:75, 40:77-40:92, 40:94-40:95, 40:97-40:108, 40:111-40:116, 40:118N-40:136, 40:138-40:156, 40:158- 40:187, 40:189-40:200, 40:202-40:207, 40:209-40:264, 40:266-40:291N, 40:293- 40:339, 40:341-40:393, 40:395-40:399N, 40:401-40:429, 40:431-40:547, 41:01:01:01-41:04, 41:05 ^w , 41:06-41:25, 41:27-41:45N, 41:47-41:59, 41:61-41:82, 44:09, 44:46:01-44:46:02, 44:75, 44:90,



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				44:129, 44:131, 44:254, 44:277, 44:356, 44:438N, 45:01:01:01-45:01:08, 45:01:10-45:15, 45:17-45:25, 45:27-45:32, 46:40:01-46:40:02, 47:02, 47:03 ^w , 48:41, 50:01:01:01-50:02:01:02, 50:04:01-50:05, 50:07-50:22, 50:31-50:74, 50:76-50:79, 55:130, 56:06, 56:45, 56:67, 58:64, 78:01:01:02-78:10, C*07:1011
7	130 bp	1070 bp	*37:06:01-37:06:02, 37:42N	*40:188, 44:257, 47:01:01:02-47:01:06, 47:05-47:10, 47:12-47:13
	195 bp		*37:36	
8⁴	120 bp	1070 bp	*37:07	*07:02:01:01-07:02:05, 07:02:07-07:02:84, 07:02:86-07:18:02, 07:20-07:24, 07:26-07:32, 07:34-07:39, 07:41-07:47, 07:49N-07:50, 07:52, 07:54-07:59, 07:61-07:99, 07:101-07:121, 07:123-07:138, 07:140-07:154, 07:156-07:163, 07:166-07:201N, 07:203-07:208, 07:210-07:219, 07:221-07:222, 07:224-07:225, 07:227-07:234, 07:236-07:260, 07:262:01-07:300, 07:302-07:331, 07:333-07:342, 07:344-07:345, 07:347-07:358, 07:360Q-07:362, 07:364-07:385, 07:387, 07:389-07:406, 07:409-07:410, 07:412-07:419, 07:421-07:441, 07:443-07:449, 07:451-07:467Q, 07:469N-07:483, 08:79:01-08:79:02, 08:156, 13:174, 15:138, 15:230, 15:241, 15:297, 40:15-40:16:01:02, 40:23, 40:32, 40:98, 40:158, 40:183, 40:198, 40:355, 40:466, 40:542, 44:150, 46:87, 48:05, 48:08, 48:15, C*02:23, C*03:260, C*04:77
9⁴	80 bp	1070 bp	*37:08	*07:27, 07:236, 08:126, 08:131, 08:139, 18:54, 27:92, 38:17, 53:03, 53:55, 55:90, 55:121, A*68:112:02
	125 bp		*37:42N	
	155 bp		*37:30N	
	215 bp		*37:22:01-37:22:02	*27:05:18:01-27:05:18:02
	495 bp			*15:209N, 39:139N
10^{4,5}	110 bp	1070 bp	*37:26	
	145 bp		*37:14	
	310 bp		*37:46	
11⁴	95 bp	1070 bp	*37:18	*07:04:01-07:04:02, 07:19, 07:25, 07:146, 07:349, 08:01:01:01-08:05, 08:07-08:08N, 08:10-08:11, 08:14-08:15, 08:17-08:19N, 08:21-08:24, 08:26:01-08:39, 08:41-08:48, 08:50-08:54:02, 08:56:01-08:59:02, 08:61-08:69, 08:71-08:78, 08:80-08:83, 08:85-08:88, 08:90-08:106, 08:108-08:128, 08:130-08:142, 08:144-08:155, 08:157-08:170, 08:172-08:180, 08:182-08:183, 08:185-08:204, 08:206-08:231, 08:233-08:253, 08:256-08:280, 08:282-08:290, 08:292-08:309, 08:311, 35:87,
	215 bp		*37:09	



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	355 bp		*37:43	
12	205 bp	1070 bp	*37:01:01:01-37:07, 37:09-37:54, 37:56-37:61, 37:63-37:66, 37:68-37:84, 37:86N-37:108	*13:23, 13:55, 15:71, 15:175, 15:204, 15:210, 15:212, 15:225, 15:344, 15:381, 15:559, 15:571, 18:12:01-18:12:02, 18:178, 18:195, 27:01-27:21:02, 27:24-27:36, 27:38-27:91, 27:93-27:108, 27:110-27:156, 27:158-27:214, 27:216-27:223N, 27:225N-27:241, 27:243N-27:245, 27:247-27:267, 35:63, 35:317, 39:101, 40:01:01-40:06:14, 40:06:16-40:07, 40:09, 40:11:01:01-40:11:02, 40:13-40:16:01:02, 40:18-40:20:01:02, 40:22N-40:24, 40:26-40:39, 40:42-40:48, 40:50:01:01-40:57, 40:59-40:67, 40:70:01-40:105, 40:107-40:109, 40:111-40:128, 40:130:01-40:136, 40:138-40:163, 40:165, 40:167-40:190, 40:192-40:209, 40:211-40:218, 40:220-40:228, 40:230-40:231, 40:233-40:243, 40:245:01-40:312, 40:314-40:317, 40:319-40:324, 40:326-40:327, 40:329-40:341, 40:343-40:356, 40:358-40:364, 40:366-40:398, 40:400-40:448, 40:450-40:456, 40:458-40:461, 40:463-40:480, 40:482-40:532, 40:534-40:547, 41:01:01:01-41:32, 41:34-41:46, 41:48-41:82, 44:15:01:01-44:15:01:02, 44:18:01:01-44:18:01:02, 44:55, 44:103, 44:131, 44:188, 44:212, 44:355, 45:01:01:01-45:21, 45:23-45:25, 45:27-45:32, 48:22, 48:30, 49:01:01:01-49:09, 49:11-49:14, 49:16-49:23, 49:27-49:30, 49:32-49:62, 49:64-49:66, 49:68-49:81, 50:01:01:01-50:02:01:02, 50:04:01-50:12, 50:14, 50:16-50:22, 50:31-50:42, 50:44-50:79, 52:51
13	255 bp	800 bp	*37:10	*13:23, 13:55, 18:09, 27:01, 27:142, 40:47, 40:96, 40:157, 40:201, 44:15:01:01-44:15:01:02, 44:55, 44:103, 44:188, 44:212, 49:02, 49:70
14⁴	110 bp	1070 bp	*37:47	*27:04:01-27:04:06, 27:06:01:01-27:06:02, 27:15, 27:20, 27:21:02, 27:24-27:25, 27:66N, 27:68-27:69, 27:91, 27:100, 27:103, 27:105, 27:109, 27:112-27:115, 27:138, 27:147, 27:149, 27:165, 27:173, 27:192, 27:208, 27:210-27:211, 27:214, 27:222, 27:226, 27:229, 27:240, 27:247, 27:257, 27:262, 27:267
	245 bp		*37:11, 37:37, 37:67	*07:143, 08:62, 08:226, 08:242, 15:71, 15:175, 15:204, 15:210, 15:212, 15:225,



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101.541-06u – without *Taq* polymerase

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Lot No.: **3S8**

Lot-specific information

				15:344, 15:381, 15:426, 15:559, 15:571, 18:01:01:01-18:01:12, 18:01:14-18:01:20, 18:01:22-18:03:02, 18:05:01:01-18:08, 18:10-18:15, 18:17N-18:24, 18:26-18:42, 18:44:01-18:48, 18:50-18:53, 18:55-18:66, 18:68-18:78, 18:80-18:106Q, 18:109-18:124, 18:126-18:131:01:02, 18:133-18:135:01:02, 18:137-18:141, 18:143-18:146, 18:148-18:193, 18:196-18:197, 18:199-18:232, 27:08, 27:12:01:01-27:12:01:03, 27:18, 27:26, 27:33, 27:40, 27:44, 27:153, 27:204:01:01-27:204:01:02, 27:242, 35:50, 35:63, 35:84, 35:162, 35:217, 35:231, 35:280, 35:317, 35:323:01-35:323:02, 35:441, 39:31:01:01-39:31:01:02, 39:101, 39:128, 40:01:01-40:01:04, 40:01:06-40:06:14, 40:06:16-40:09, 40:11:01:01-40:11:02, 40:14:01-40:16:01:02, 40:18, 40:20:01:01-40:20:01:02, 40:22N-40:36, 40:38-40:39, 40:42-40:46, 40:48, 40:50:01:01-40:57, 40:59-40:75, 40:77-40:95, 40:97-40:108, 40:111-40:116, 40:118N-40:128, 40:130:01-40:134, 40:136, 40:138-40:156, 40:158-40:163, 40:165-40:187, 40:189-40:190, 40:192-40:200, 40:202-40:209, 40:211-40:218, 40:220-40:228, 40:230-40:255, 40:257-40:280, 40:282-40:291N, 40:293-40:305, 40:307-40:317, 40:319-40:324, 40:326-40:327, 40:329-40:334:02, 40:336-40:339, 40:341, 40:343, 40:345N-40:364, 40:366-40:393, 40:395-40:398, 40:400-40:422, 40:424-40:448, 40:450-40:456, 40:458-40:461, 40:463-40:527, 40:529-40:531, 40:534-40:547, 41:01:01:01-41:04, 41:06-41:32, 41:34-41:45N, 41:48-41:59, 41:61-41:82, 42:02:01:01-42:02:02, 42:09, 42:17-42:18, 42:26-42:27, 44:131, 45:01:01:01-45:25, 45:27-45:32, 46:14, 48:22, 48:30, 50:01:01:01-50:01:17, 50:01:19-50:02:01:02, 50:04:01-50:12, 50:14-50:22, 50:31-50:42, 50:44-50:79, 54:02, 55:16, 56:35, 73:01:01:01-73:03, C*03:278, C*03:504, C*07:714, C*07:724, C*16:86
15	135 bp	1070 bp	*37:11, 37:37, 37:67	*07:65, 07:134, 07:400, 08:32, 08:133, 08:180, 08:239, 15:202, 15:239, 15:308, 15:376, 18:01:01:01-18:01:20, 18:01:22-18:03:01:03, 18:04:01-18:08, 18:10-18:15, 18:17N-18:36, 18:38-18:47, 18:50-18:53, 18:55-18:65, 18:68-18:78, 18:80-18:106Q, 18:109-18:124, 18:126-18:131:01:02, 18:133-18:135:01:02, 18:137-18:141, 18:143-18:146, 18:148-18:177, 18:179-18:193, 18:196-18:197, 18:199-18:232, 35:01:01:01-35:01:51, 35:01:53-35:02:02,



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				35:02:04-35:02:08, 35:02:10-35:02:13, 35:02:15-35:03:02, 35:03:04-35:08:01:13, 35:08:03-35:08:04, 35:08:06-35:18, 35:20:01-35:24:02, 35:28:01:01-35:43:01, 35:43:03-35:45, 35:48, 35:50-35:55, 35:57- 35:62, 35:64:01-35:72, 35:74-35:153, 35:155-35:197, 35:199-35:202, 35:204- 35:206, 35:208:01-35:209, 35:211-35:216N, 35:218-35:221, 35:223-35:253, 35:255- 35:270, 35:272-35:273, 35:275-35:298, 35:300-35:310, 35:312-35:316, 35:318- 35:328, 35:330-35:354, 35:356-35:360, 35:362-35:449, 35:451-35:470, 35:472- 35:524, 35:526-35:549, 35:552-35:569, 35:571-35:582, 35:584-35:586, 39:19:01- 39:19:02, 39:186, 40:185, 40:209, 40:308, 40:350, 40:365, 45:22, 46:40:01-46:40:02, 55:130, 56:06, 56:45, 58:64, 78:01:01:02- 78:05, 78:07-78:08, C*07:1011
16	315 bp 170 bp	1070 bp	*37:45 *37:09, 37:12, 37:35, 37:56, 37:77, 37:84	*07:04:01-07:04:02, 07:19, 07:25, 07:146, 07:349, 08:01:01:01-08:01:22, 08:01:24- 08:05, 08:07-08:12:03, 08:15-08:19N, 08:21-08:24, 08:26:01-08:27, 08:29-08:39, 08:41-08:48, 08:50-08:54:02, 08:56:01- 08:69, 08:71-08:73, 08:75-08:78, 08:80- 08:86N, 08:88-08:110, 08:112-08:142, 08:144-08:155, 08:157-08:170, 08:172- 08:199, 08:201-08:204, 08:206-08:226, 08:228-08:244, 08:246-08:250, 08:252N- 08:254, 08:256-08:263, 08:265-08:280, 08:282-08:311, 13:154, 15:51, 15:83:01:01- 15:83:01:02, 15:179:01-15:179:02, 15:199, 15:218Q, 15:518, 18:56, 18:113, 35:38, 35:87, 35:115, 35:169, 35:260, 38:30, 39:156, 40:136, 40:231, 40:279, 41:01:01:01-41:09, 41:11-41:51, 41:53- 41:61, 41:63-41:79, 41:81-41:82, 42:01:01:01-42:02:02, 42:04-42:18, 42:21- 42:34, 44:14, 44:17, 44:51, 44:62, 44:123, 44:166, 44:213, 44:230, 45:09, 45:14, 51:08:01:01-51:08:06, 51:20, 51:36, 51:44N, 51:97, 51:141, 51:153:01- 51:153:02, 51:263, 51:275, 51:342, 51:354, 51:362, 51:371, 52:19, 53:22, 55:20, 55:56, 56:13, 57:09, 57:24, 57:119, 82:01:01:01- 82:04, C*07:626
	195 bp		*37:20	
17 ⁷	165 bp 195 bp	1070 bp	*37:25 *37:20	*45:03
18	135 bp	1070 bp	*37:11, 37:14, 37:29, 37:37, 37:67	*07:65, 07:134, 07:400, 08:32, 08:133, 08:180, 08:239, 15:202, 15:239, 15:308, 15:376, 18:01:01:01-18:01:20, 18:01:22- 18:03:01:03, 18:04:01-18:08, 18:10-18:15, 18:17N-18:36, 18:38-18:47, 18:50-18:53,



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Lot-specific information

				18:55-18:65, 18:68-18:78, 18:80-18:106Q, 18:109-18:124, 18:126-18:131:01:02, 18:133-18:135:01:02, 18:137-18:141, 18:143-18:177, 18:179-18:193, 18:196-18:197, 18:199-18:232, 35:01:01:01-35:01:51, 35:01:53-35:02:08, 35:02:10-35:02:13, 35:02:15-35:03:02, 35:03:04-35:08:01:13, 35:08:03-35:08:04, 35:08:06-35:18, 35:20:01-35:24:02, 35:28:01:01-35:43:01, 35:43:03-35:45, 35:48, 35:50-35:51:02, 35:53N-35:55, 35:57-35:62, 35:64:01-35:72, 35:74-35:153, 35:155-35:197, 35:199-35:202, 35:204-35:206, 35:208:01-35:209, 35:211-35:216N, 35:218-35:253, 35:255-35:270, 35:272-35:273, 35:275-35:292, 35:294-35:298, 35:300-35:309, 35:312-35:316, 35:318-35:354, 35:356-35:360, 35:362-35:449, 35:451-35:470, 35:472-35:549, 35:552-35:569, 35:571-35:582, 35:584-35:586, 39:19:01-39:19:02, 39:186, 40:185, 40:209, 40:308, 40:350, 40:365, 45:22, 46:40:01-46:40:02, 55:130, 56:06, 56:45, 58:64, 78:01:01:02-78:05, 78:07-78:08, C*07:1011
19⁷	215 bp	1070 bp	*37:21, 37:67	*08:62, 08:242, 18:07:01-18:07:03:02, 18:29, 18:79, 18:136, 27:23, 35:50, 35:84, 35:162, 35:217, 35:231, 35:280, 35:323:01-35:323:02, 35:441, 40:07-40:08:01:02, 40:13, 40:68, 40:106, 40:162, 40:220, 40:232, 41:46, 41:82, 42:26, 49:67, 51:103, 51:116, 51:151, 51:354
20	315 bp 195 bp 230 bp	800 bp	*37:45 *37:36 *37:16Q, 37:39, 37:48, 37:97	*15:32:01-15:32:02, 15:299, 15:583, 35:48, 35:433, 44:209, 53:07, 53:65, 58:121, C*03:90, C*03:103, C*03:178, C*03:300, C*03:474, C*07:03, C*07:186, C*07:242, C*07:265, C*07:494Q, C*07:748
21⁵	165 bp 195 bp 270 bp	1070 bp	*37:27 *37:33N *37:24	*27:57 *27:94N *27:122, 40:152
22	175 bp	1070 bp	*37:17	*07:437, 40:153
23^{4,6}	90 bp	1070 bp	*37:19:01	*14:10, 15:460, 35:59:01, 35:242, 38:20:01, 39:42, 39:106, 39:195, 44:117, 44:251, C*03:26:02, C*15:05:20, C*15:140, C*15:152:03, C*17:01:10
	350 bp		*37:23, 37:43	*07:329, 13:151, 15:227, 15:630, 15:641, 18:183, 27:69, 27:192, 27:266, 40:213, 40:485, 42:28, 44:338, 51:32, 58:52
24	170 bp	1070 bp	*37:52	*41:55, 54:02, C*03:278, C*03:504, C*06:77, C*07:714, C*07:724, C*16:86
25	375 bp	1070 bp	*37:02	*15:129, 15:342, 15:395, 27:18, 27:29, 40:225:02, 40:429, 40:469, 47:04-47:05, 48:21, 48:26



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Lot-specific information

26	220 bp	1070 bp	*37:58	*38:61
27⁴	80 bp	1070 bp	*37:68	
28	170 bp	1070 bp	*37:15	*27:203, 27:241
29	195 bp	1070 bp	*37:33N	*27:94N
30	335 bp	1070 bp	*37:19:01-37:19:02, 37:50 ^w	*27:19:01:01-27:19:01:02, 27:127, 35:203, 35:355, 44:257, 53:03, 53:55
31⁸	-	-	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-B*37 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.

⁴HLA-specific PCR products shorter than 125 base pairs have a lower intensity and are less sharp than longer PCR products.

⁵Primer mixes 10 and 21 may have tendency of unspecific amplification.

⁶Primer mix 23 has a tendency of giving rise to primer oligomer formation.

⁷Primer mixes 17 and 19 may give rise to a lower yield of HLA-specific PCR product than the other B*37 primer mixes.

⁸Primer mix 31 contains a negative control, which will amplify the majority 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 200 base pairs.

Abbreviations

w: may be weakly amplified.



101.541-06 – including *Taq* polymerase
101.541-06u – without *Taq* polymerase

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Lot-specific information

PRIMER SPECIFICATION

Well No.	1	2	3	4	5	6	7	8	9	10	11	12
Length of spec.	210	95	200	200	210	145	130	120	80	110	95	205
PCR product		135	235	240			195		125	145	215	
									155	310	355	
									215			
									495			
Length of int.	800	800	1070	1070	1070	1070	1070	1070	1070	1070	1070	1070
pos. control ¹												
5'-primer(s) ²	368 5'-gTC 3'	206 5'-AgA 3'	142 5'-TCT 3'	368 5'-gTC 3'	141 5'-ATA 3'	206 5'-gAA 3'	149 5'-ggT 3'	527 5'-TgA 3'	126 5'-ggA 3'	206 5'-gAC 3'	363 5'-AgC 3'	97 5'-TCC 3'
		363 5'-AAT 3'	368 5'-gTC 3'		142 5'-TCT 3'	206 5'-gAC 3'	206 5'-gAA 3'		141 5'-ATT 3'	3 rd I 5'-Agg 3'	483 5'-gAA 3'	
							215 5'-Cg 3'		215 5'-Cg 3'		3 rd I 5'-Agg 3'	
									261 5'-AAC 3'			
									355 5'-CCA 3'			
3'-primer(s) ³	538 5'-gTC 3'	301 5'-gTC 3'	337 5'-CTA 3'	527 5'-CCT 3'	311 5'-ggg 3'	311 5'-ggT 3'	301 5'-gTC 3'	605 5'-gCT 3'	301 5'-gTC 3'	275 5'-TCA 3'	538 5'-gTC 3'	259 5'-CTC 3'
		418 5'-gTC 3'	527 5'-CCT 3'	559 5'-CAg 3'	311 5'-ggg 3'				471 5'-gTT 3'	311 5'-ggT 3'	884 5'-ggT 3'	259 5'-CTC 3'
				583 5'-gTg 3'						839 5'-ATT 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.	255	110	135	170	165	135	215	195	165	175	90	170
PCR product		245	315	195	195		315	230	195		350	
									270			
Length of int.	800	1070	1070	1070	1070	1070	1070	800	1070	1070	1070	1070
pos. control ¹												
5'-primer(s) ²	97 5'-TCC 3'	97 5'-TCC 3'	206 5'-gAC 3'	385 5'-ggg 3'	385 5'-ggg 3'	206 5'-gAC 3'	97 5'-TCC 3'	149 5'-ggT 3'	97 5'-TCC 3'	520 5'-CgA 3'	369 5'-TAC 3'	97 5'-TCC 3'
		704 5'-Tgg 3'	737 5'-Cgg 3'	409 5'-ggC 3'	416 5'-CCg 3'		737 5'-Cgg 3'	368 5'-gTC 3'			3 rd I 5'-Agg 3'	
3'-primer(s) ³	309 5'-gTg 3'	302 5'-ggC 3'	302 5'-ggC 3'	538 5'-gTC 3'	538 5'-gTC 3'	301 5'-gCT 3'	272 5'-TgA 3'	301 5'-gTC 3'	221 5'-ACC 3'	3 rd I 5'-TAT 3'	419 5'-CgA 3'	226 5'-CAC 3'
		774 5'-ggT 3'	916 5'-gAT 3'				916 5'-gAT 3'	559 5'-CAg 3'	251 5'-CCT 3'		872 5'-TCA 3'	
								563 5'-CgT 3'	326 5'-TgC 3'		884 5'-ggT 3'	
Well No.	13	14	15	16	17	18	19	20	21	22	23	24



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Lot-specific information

Well No.	25	26	27	28	29	30
Length of spec.	375	220	80	170	195	335
PCR product						
Length of int.	1070	1070	1070	1070	1070	1070
pos. control ¹						
5'-primer(s) ²	272	142	1049	97	97	302
	5' -CTC 3'	5' -TCT 3'	5' -C 3'	5' -TCC 3'	5' -TCC 3'	5' -ggA 3'
3'-primer(s) ³	362	320	1088	227	251	353
	5' -TAT 3'	5' -AgT 3'	5' -AT 3'	5' -CTg 3'	5' -CCT 3'	5' -TgA 3'
Well No.	25	26	27	28	29	30

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.



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Lot No.: **3S8**

Lot-specific information

CELL LINE VALIDATION SHEET																				
HLA-B*37 SSP primer set ²																				
					Well															
					1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
				Prod. No.:	202013801	202013802	202013803	202013804	202134905	202013806	202013807	202013808	202356409	202013810	202134911	202013812	202013813	202013814	202013815	202013816
	IHCW cell line ¹		B*																	
1	9001	SA	*07:02		-	-	-	-	-	-	-	+	-	-	-	-	-	-	-	-
2	9280	LK707	*52:01	*73:01	-	-	-	-	-	-	-	-	-	-	-	-	-	+	-	-
3	9011	E4181324	*52:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4	9275	GU373	*15:10	*53:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
5	9009	KAS011	*37:01		+	-	-	-	+	-	-	-	-	-	-	-	-	-	-	-
6	9353	SM	*39:01	*51:01	-	-	-	-	-	-	-	-	-	-	-	+	-	-	-	-
7	9020	QBL	*18:01		-	-	-	-	-	+	-	-	-	-	-	-	-	+	+	-
8	9025	DEU	*35:01		-	-	-	-	-	+	-	-	-	-	-	-	-	-	+	-
9	9026	YAR	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
10	9107	LKT3	*54:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
11	9051	PITOUT	*44:03		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
12	9052	DBB	*57:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	9004	JESTHOM	*27:05		-	+	-	-	-	-	-	-	-	-	-	+	-	-	-	-
14	9071	OLGA	*15:01	*15:20	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
15	9075	DKB	*40:01		-	-	-	-	-	+	-	-	-	-	-	+	-	+	-	-
16	9037	SWEIG007	*40:02		-	-	-	-	-	+	-	-	-	-	-	+	-	+	-	-
17	9282	CTM3953540	*08:01	*55:01	-	-	-	-	-	-	-	-	-	-	-	+	-	-	-	+
18	9257	32367	*14:01	*56:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
19	9038	BM16	*18:01		-	-	-	-	-	+	-	-	-	-	-	-	-	+	+	-
20	9059	SLE005	*40:01		-	-	-	-	-	+	-	-	-	-	-	-	+	+	-	-
21	9064	AMALA	*15:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
22	9056	KOSE	*35:03		-	-	-	-	-	+	-	-	-	-	-	-	-	-	+	-
23	9124	IHL	*40:02	*56:02	-	-	-	-	-	+	-	-	-	-	-	+	-	+	-	-
24	9035	JBUSH	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
25	9049	IBW9	*14:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
26	9285	WT49	*58:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
27	9191	CH1007	*07:05	*51:01	-	-	-	-	-	-	-	+	-	-	-	-	-	-	-	-
28	9320	BEL5GB	*44:02	*44:03	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
29	9050	MOU	*44:03		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
30	9021	RSH	*42:01		-	-	-	-	-	-	-	-	-	-	-	+	-	-	-	+
31	9019	DUCAF	*18:01		-	-	-	-	-	+	-	-	-	-	-	-	-	+	+	-
32	9297	HAG	*41:02		-	-	-	-	-	+	-	-	-	-	-	+	+	-	+	+
33	9098	MT14B	*40:01		-	-	-	-	-	+	-	-	-	-	-	+	-	+	-	-
34	9104	DHIF	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
35	9302	SSTO	*44:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
36	9024	KT17	*15:01	*35:01	-	-	-	-	-	+	-	-	-	-	-	-	-	-	+	-
37	9065	HHKB	*07:02		-	-	-	-	-	-	-	+	-	-	-	-	-	-	-	-
38	9099	LZL	*15:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
39	9315	CML	*08:01	*27:05	-	+	-	-	-	-	-	-	-	-	-	+	+	-	-	+
40	9134	WHONP199	*13:02	*46:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
41	9055	H0301	*14:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
42	9066	TAB089	*46:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
43	9076	T7526	*46:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
44	9057	TEM	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
45	9239	SHJO	*42:01	*50:01	-	-	-	-	-	+	-	-	-	-	-	+	+	-	+	+
46	9013	SCHU	*07:02		-	-	-	-	-	-	-	+	-	-	-	-	-	-	-	-
47	9045	TUBO	*51:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
48	9303	TER-ND	*35:01	*44:03	-	-	-	-	-	+	-	-	-	-	-	-	-	-	+	-

101.541-06 – including *Taq* polymerase

101.541-06u – without *Taq* polymerase

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“Instructions for Use” (IFU)

Lot No.: **3S8**

Lot-specific information

CELL LINE VALIDATION SHEET																																
HLA-B*37 SSP primer set ²																																
					Well																											
						17	18	19	20	21	22	23	24	25	26	27	28	29	30													
				Prod. No.:		202013817	202013824	202013819	202013820	202013821	202013822	202013823	202013824	202013825	202013826	202013827	202013828	202134929	202134930													
	IHWC cell line ¹		B*																													
1	9001	SA	*07:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
2	9280	LK707	*52:01	*73:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
3	9011	E4181324	*52:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
4	9275	GU373	*15:10	*53:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
5	9009	KAS011	*37:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
6	9353	SM	*39:01	*51:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
7	9020	QBL	*18:01		-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
8	9025	DEU	*35:01		-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
9	9026	YAR	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
10	9107	LKT3	*54:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
11	9051	PITOUT	*44:03		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
12	9052	DBB	*57:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
13	9004	JESTHOM	*27:05		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
14	9071	OLGA	*15:01	*15:20	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
15	9075	DKB	*40:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
16	9037	SWEIG007	*40:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
17	9282	CTM3953540	*08:01	*55:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
18	9257	32367	*14:01	*56:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
19	9038	BM16	*18:01		-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
20	9059	SLE005	*40:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
21	9064	AMALA	*15:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
22	9056	KOSE	*35:03		-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
23	9124	IHL	*40:02	*56:02	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
24	9035	JBUSH	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
25	9049	IBW9	*14:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
26	9285	WT49	*58:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
27	9191	CH1007	*07:05	*51:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
28	9320	BEL5GB	*44:02	*44:03	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
29	9050	MOU	*44:03		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
30	9021	RSH	*42:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
31	9019	DUCAF	*18:01		-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
32	9297	HAG	*41:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
33	9098	MT14B	*40:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
34	9104	DHIF	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
35	9302	SSTO	*44:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
36	9024	KT17	*15:01	*35:01	-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
37	9065	HHKB	*07:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
38	9099	LZL	*15:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
39	9315	CML	*08:01	*27:05	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
40	9134	WHONP199	*13:02	*46:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
41	9055	H0301	*14:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
42	9066	TAB089	*46:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
43	9076	T7526	*46:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
44	9057	TEM	*38:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
45	9239	SHJO	*42:01	*50:01	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
46	9013	SCHU	*07:02		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
47	9045	TUBO	*51:01		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
48	9303	TER-ND	*35:01	*44:03	-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	



101.541-06 – including *Taq* polymerase
101.541-06u – without *Taq* polymerase

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Lot No.: **3S8**

Lot-specific information

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 allele to be amplified by primer solutions 3, 4, 9, 10, 13, 17, 20 to 24 and 26 to 30 were available. The specificities of the primers in primer solutions 4, 9, 10, 13, 20, 23, 24 and 30 were tested by separately adding one or two additional 3'-primers, and one or two additional 5'-primers accordingly.

In primer solutions 3, 21 and 26 to 29 it was only possible to test the 5'-primers, the 3'-primers were not possible to be tested. In primer solutions 17 and 22 it was only possible to test the 3'-primer, the 5'-primers were not possible to be tested. In primer solutions 4, 9 to 11, 20 and 23 one or two of the 3'-primers were not possible to be tested, and in primer solutions 5, 7, 9, 11, 15, 16, 19 and 20 one or two of the 5'-primers were not possible to be tested. In addition, one or more 3'-primers or 5'-primers in primer solutions 7, 11, 15 and 19 were tested by separately adding one 5'-primer or 3'-primer respectively.



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For *In Vitro* Diagnostic Use
MA123 v02 SSP PI Template
Date: September 2023, Rev. No: 00

101.541-06 – including *Taq* polymerase
101.541-06u – without *Taq* polymerase

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Lot No.: **3S8**

Lot-specific information

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Fax: +46-8-717 88 18

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Web page: www.caredx.com

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