

UK NEQAS for H&I Scheme 6 - HLA Antibody Detection

SAMPLES 6 01-10/2016

DESPATCHED ON 26TH JANUARY 2016

COMPLEMENT DEPENDENT CYTOTOXICITY (CDC) TECHNIQUE INFORMATION

Lab No	Technique	Cell source	Frozen trays	In-house Commercial	Panel		Complement source	Volume added per well				Incubation		Dead cell visualisation	Analysis Procedures	Software Manufacturer	%PRA considered pos	Comments
					Composition	Size		Sera	Comp	DTT	Pre-C'	Post-C'						
20	NIH	B-cells	No		Random	40	Cedarlane	1	1	5	1	60	45	EB+AO	Manual/Computerised	In-House	>6%	
28	CDC	Yes	Yes	One Lambda	Selected	30	Cedarlane	1	1	5		30	60	Fluoroquen	Manual			
29	NIH	T-cells	Yes	One Lambda	Selected	58 (+2)	Cedarlane	1	1	5		30	60	Fluoroquen	Manual			
42	NIH	PBL	Yes	In-house	Mixture	40	TCS Biosciences	1	1	5	1	60	120	Fluoroquen	Manual			CDC is used in conjunction with the Class I ID and SA kits to determine specificities
101		T-cells	Yes	GenTrak	Selected	30	Commercial	2	2	6	2	30	60	Fluoroquen	Manual			T-cell panel dependant
114	NIH	T and B-cells	No		Random	50	Commercial	1	1	5	0.1	30	60	Fluoroquen	Computerised	One Lambda		
120	Standard CDC	T and B-cells	Yes	In-house	Selected	36	Cedarlane	1	1	6	2	25	50	Fluoroquen	Computerised	Lambda scan	20%	
136	NIH	PBL	No		Mixture/Selected	45	In-house	1	1	5		30	60	EB+AO	Computerised	One Lambda	5	
139	NIH	PBL	Yes	GenTrak	Selected	30	Cedarlane	1	2	5		30	60	Fluoroquen	Manual			
154	NIH	T-cells	Yes	Servbio	Mixture	30	Servbio	2	2	5		30	60	Eosin	Manual			Any positive results
186	NIH	PBL	No	In-house	Selected	34	Invitrogen	1	1	6	1	30	60	EB+AO	Manual			
194	CDC	PBL	No	In-house	Selected	42	In-house	1	1	5		30	60	Fluoroquen	Computerised	One Lambda	5%	
206	NIH	PBL	Yes	In-house	Selected		Cedarlane	1	1	5	1	30	90	Fluoroquen	Manual			10%. CDC is always used along with Luminex
223		T-cells	No		Random		Innotrain	0.5	0.5	2		45	60	EB+AO	Manual			
227	NIH	PBL	No		Random	30	Immucor	1	1	6	5	30	60	Fluoroquen	Manual			
238	NIH	PBL	No		Selected	40	Invitrogen	1	1	5		30	60	Fluoroquen	Computerised	Commercial	Any % PRA >0	
245	NIH	T-cells	Yes	GenTrak	Selected	30	BAG	2	2	5	0.1	30	60	EB+AO	Manual			3% (1/30)
284	With and without DTT	PBL	No		Selected	30	Cedarlane	1	1	5	1	45	75	EB+AO	Manual/Computerised	Lymhoe	1	
294	AHG	T-cells	Yes	GenTrak	Selected	60	GenTrak	2	2	5		30	60	Fluoroquen	Manual			
311	NIH	PBL	Yes	GenTrak	Selected		Servbio	2	2	5		45	90	Fluoroquen	Manual			3%
315		T-cells	Yes	Servbio	Selected	30	Servbio	1	2	5	1/20	30	60	Fluoroquen	Manual/Computerised	SeraTrack	>5%	

FLOW CYTOMETRY TECHNIQUE INFORMATION

Lab No	Flow Cytometer Model	Cell		Conjugate	Manufacturer	Conjugate	Manufacturer	Software	Manufacturer	Comments
		preparations	source							
115	BD FACS Canto II									
153	BD	T and B-cells	One Lambda	FITC anti-human IgG FAB2	One Lambda			DIVA	BD	
264	BD		One Lambda					DIVA	BD	
335	FACSCanto II		One Lambda	Anti-Human IgG-FITC	One Lambda					

ELISA TECHNIQUE INFORMATION

Lab No	ELISA kit(s) used	Batch No.	Manufacturer	ELISA kit(s) used	Batch No.	Manufacturer	Comments
117	LATM10	011	One Lambda				

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LUMINEX TECHNIQUE INFORMATION

Lab No	LUMINEX kit(s) used	Batch No.	Bead Volume (µl)	Serum Volume (µl)	Details of +/- cut off	LUMINEX kit(s) used	Batch No.	Bead Volume (µl)	Serum Volume (µl)	Details of +/- cut off	LUMINEX kit(s) used	Batch No.	Bead Volume (µl)	Serum Volume (µl)	Details of +/- cut off	LUMINEX kit(s) used	Batch No.
11	LS1A04	009	20	20	1000MFI	LS2A01	011	2	20	1000MFI	LSM12	20	2.5	20	Ratio >2.5		
12	LSM12	20	2	8	Ratio >5 = pos												
14	LS1A04	009	2	10	1500MFI	LS2A01	011	2	10	1500MFI	LSM12	20	2	10	1.5 = pos, 1.2 = neg	LS2A01	011
15	LS1PRA	016	2	8	1000MFI	LS2PRA	015	2	8	1000MFI	LS1A04	009	2	8	1000MFI		
19	LSM12	020	2	8	CI 4.1 CII 3.1												
20	LSM12	020	2	8	500												
23	LSM12	020	2.5	2.5	CI 5.2 CII 3.6												
24	LMX	3002973/3002956	22.5	6		LS1PRA	016	3.5	14	1000MFI	LS2PRA	015	3.5	14	1000MFI		
25	LS1A04	009	2.5	10	1000MFI	LS2A01	010	2.5	10	1000MFI	LSM12	020	5	20	Ratio 6.0		
26	LSM12	020	20	20													
28	LSM12	81837	3	20	ratio <1.8 Neg												
29	LM1	3002701	5	12.5		LM2	3002630	5	12.5		LMX	3002973	5	12.5		LSA1	05265D
34	LSM12	020	5	20		LS1PRA	015	2.5	20	1000MFI	LSM12	020	2	20	500MFI		
38	LMX	3002973	2.5	20		LS2PRA	015	2.5	20	1500MFI	LSM12	020	2.5	20	Ratio >2.0 = pos		
39	LS1PRA	016	2.5	20													
41	LSM12					LS2A01					LSM12	020	2	10	CI ratio 4.5		
42	LS1A04					LS2PRA	15	2.5	10	500	LSM12	20	2.5	10	CII ratio 3.5	LS2A01	011
45	LS1PRA	16	2.5	10	500	LSM12	020	2	10		LSM12	020	2	10	Various ratio	LS2A01	009
48	LM1	3002701	2	8		LSAII	3002807	2	8		LS1A04	009	3	12		LSM12	020
51	LSA1																
54	LSM12	20	2	8	>350												
56	LMX	2973	2.5	6.25		LS1A04	009	2.5	10	pos > 1000	LS2A01	011	2.5	10	pos > 1000		
62	LSM12	20	2.5	10	NGB ratio >1.5												
100	LM1	3002701	5	12.5		LM2	3003072	5	12.5		LMX	3002691	5	12.5			
101	LSM12																
112	LMX	3002973	5	12.5	500MFI												
114	LSM12	20	2.5	10	Ratio >5	LSAII	08245C	40	10	500MFI	LSAII	011665	40	10	500MFI		
115																	
117	LSM12	20	5	20	Ratio 1.5-2.0												
120	LSM12	020	5	18	Ratio >3												
127	LSM12																
128	LSM12	020	5	20	NBG ratio >5												
133	LMX																
136	LSM12	019	2.5	10	1000MFI												
139	LSM12	020	5	20	neg <6, pos >6												
142	LSM12																
143	LS1PRA	016	5	20	1000MFI	LSM12	020	5	20	1000MFI							
147	LSM12	020	5	20	Ratio >5												
154	LSM12	020	5	20	Ratio >3.5												
158																	
160	LS1A04	009	5	20	1000MFI	LS2A01	010	5	20	1000MFI	LSM12	020	5	20			
162	LSM12	020	2.2	10	3												
163	LSM12	020	5	18	pos =4, neg <2.5												
164	LS1A04	66545	2.5	20	1500MFI	LS2A01	64807	2.5	20	1500MFI	LSM12	63524	2.5	20	ratio >4		
169	LS1A04	009	3	10	1000MFI	LS2A01	011	3	10	1000MFI	LSM12	019	3	10	5000MFI		
181	LS1A04	009	5	20	500MFI	LS2A01	011	5	20	500MFI	LSM12	20	5	20	Ratio =5		
186	LMX	3002973_3002956	5	12.5													
189	LMX																
190	LS1A04	62	5	20	>1000MFI pos	LS2A01	62	5	20		LSM12	62	5	20			
191	LSM12	001	5	20	1000MFI												
193	LSM12	020	5	20	Ratio >2.5												
194	LMX	3002973	5	12.5		LSM12	61619	5	20								
195																	
204	LSM12	20	4	20	CI >3, CII >2.5												
205	LMX	3002973	5	12.5													
206	LMX	3003153	5	12.5													
209	LSM12	20	5	20	NBG ratio >2												
212	LMX	3003153	5	12.5	1000MFI												
214	LMX	3002973	5	12.5	1000												
227	LM1					LM2		5	12.5	1000 raw	LS1A04		5	20	1000 baseline	LS2A01	
229	LMX																
230	LMX	1	5	12.5	MFI <1000 = neg												
231	LM1					LM2					LMX	3002506		12.5			
232	LM1	3157	5	12.5	1000	LSA1	3072	5	12.5	1000							
238	LMX	3003153	5	12.5													
239	LMX	3002732	5	12.5	800												
240	LMX	3002749	5	12.5	440												
242	LMX	17022016	4	20	400MFI												
245	LSM12	20	4	20	4 ratio												
252	LMX																
254																	
259	LMX	3002749-3002742	5	12.5													
262	LMX	3003153	5	12.5	ADJ >1												
264	LSM12																
268	LMX	3003553-30003124	5	12.5	CI >500, CII >800												
273	LSM12	020	4	20	>NBG ratio 5.5												
277	LSM12	20	16	20	<2.0												
284	LSM12	63524	5	20	Ratio >3												
292	LSM12																
293	LS1A04	009	5	20	Ratio >2.5	LS2A01	011	5	20	500MFI	LSM12	020	5	20	500MFI		
294	LMX	3002973	5	12.5	500MFI												
297	LSM12																
302	LM1	3002915	5	12.5	Ratio =4	LM2	3002907	5	12.5	1000MFI	LMX	3002749	5	12.5	>2		
303	LSM12																
309	LMX	3003153	5	12.5	NBG ratio >3												
311	LSM12																
315	LMX	3002973	5	12.5	Ratio 4	LSM12	020			>500MFI							
318	LMX	3002749-3002732	5	12.5	ADJ >1												
322																	
323	LSM12	20	5	20													

Immucoor One Lambda
 LM1 Class I ID Kit LS1PRA LABScreen PRA Class I ID Kit
 LM2 Class II ID Kit LS2PRA LABScreen PRA Class II ID Kit
 LMX Lifecodes Lifescreen Deluxe Kit LS12PRA LABScreen PRA Class Lifecodes Lifescreen Deluxe Kit
 LSAI Lifecodes Lifescreen SA Class I LS1A04 LS SA Class I Lifecodes Lifescreen SA Class I
 LSAII Lifecodes Lifescreen SA Class II LS2A01 LS SA Class II Lifecodes Lifescreen SA Class II
 LSAI&II Lifecodes Lifescreen SA Class I&II LSM12 LS Mixed Class I&II Lifecodes Lifescreen SA Class I&II

Note: UK NEQAS for H&I have used participant and manufacturer's information to aid consistency with methodological information. Please report any errors to Deborah Pritchard on UKNEQASHandI@wales.nhs.uk

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LUMINEX TECHNIQUE INFORMATION

Lab No	Positive control serum for Luminex testing?	Source	Positive control serum			If no:	Samples stored prior to testing?	Conditions?	Storage time? (hours)	Methods used?	Serum treatment		Criteria?
			Every run?	If no:	Same serum?						Dilution/ Other		
9	No												
11	Yes	Pooled sensitised patient sera	Yes		No	Different pos controls used for SA beads, not used for Scheme 6	Sometimes -20	>48			Dilution		High background
12	No						Sometimes -10	24-48	Adsorption beads				High background
14	Yes	Sensitised patient sera	Yes	No		Sensitised patient control sera for each kit chosen by Ab profile	Always -20	>48	Heat inactivation, EDTA				Borderline by screening
15	Yes	Pooled HSP sera	Yes	Yes			Yes 5	>48	EDTA, Adsorption beads				
19	Yes	Sensitised patient sera	Yes	Yes			Yes RT	24-48					
20	Yes	Sensitised patient sera	Yes	Yes			Always -80	>48	EDTA				
23	Yes	Positive patient sera diluted 1:2	Yes	Yes			Always -35	>48					
24	Yes	Sensitised patient sera	Yes	No		Kit Dependent	Always -20	>48					
25	Yes	Sensitised patient sera	No	No			Yes Frozen	<24					
26	Yes	Sensitised patient sera	Yes	Yes			Sometimes 4	24-48	EDTA, Adsorption beads				Low PC NC ratio or High background
28	Yes	Sensitised patient sera	Yes	Yes			Yes -20	>48	EDTA				
29	Yes	Manufacturer	Yes	No		Kit Dependent	Sometimes 4	24-48	Adsorption beads				High background
34	Yes	Sensitised patient sera	Yes	Yes			Sometimes -40	24-48					
38	Yes	Sensitised patient sera	Yes	No		Kit Dependent	Always -40	<24	EDTA				IgG/M screening and specificity testing
39	Yes	Sensitised patient sera	Yes	Yes			Always -40	>48	EDTA, Adsorption beads				High background
41	Yes	Sensitised patient sera	Yes	Yes			Yes -40	>48	EDTA, Adsorption beads				
42	Yes	Sensitised patient sera	Yes	Yes			Always -40	24-48	EDTA, Adsorption beads		Dilution		
45	Yes	Pooled sensitised patient sera	Yes	Yes			Always -45	>48	EDTA, Adsorption beads				
48	Yes	Pooled sensitised patient sera	Yes	No		Kit Dependent	Sometimes -20	>48	Heat inactivation, Adsorption beads				
51	Yes	Pooled sensitised patient sera	Yes	Yes			Always -40	>48	EDTA, Adsorption beads				EDTA used for SA tests
54	Yes	Pooled sensitised patient sera	Yes	Yes			Always -20	>48	Adsorption beads				NC >500
58	Yes	Sensitised patient sera, Manufacturer	Yes	No		Kit Dependent	Always -20	>48			FCS 5%		
62	Yes	Manufacturer	Yes	Yes			Always -70	>48					
100	Yes	Manufacturer	Yes	No		Pos control is assay specific	Always -20	>48					
101	Yes	Sensitised patient sera	Yes	Yes			Always -20	>48	Adsorption beads		DTT		High background
112	Yes	UK NEQAS 2015 sera	Yes	No		Only screening	Yes -20	>48					
114	Yes	Pooled sensitised patient sera	Yes	Yes			Sometimes -20	24-48	Adsorption beads				
115													
117	No						Always -65	>48	Adsorption beads				
120	Yes	Pooled positive sera from plasma donors	Yes	No		Used only for LSM12 kits	Always -20	24-48	EDTA, Adsorption beads		Dilution		NC baseline >500 and/or PC baseline >4000
127	Yes	Pooled patients sera	Yes	Yes			Always -30	>48	Adsorption beads				
128	Yes	Sensitised patient sera	Yes	Yes			Yes -22	>48					
133	Yes	Manufacturer	Yes	Yes			Always -20	>48	Adsorption beads				High background
136	Yes	Sensitised patient sera	Yes	Yes		Kit Dependent	Yes -20	>48	Adsorption beads				High background
139	Yes	Sensitised patient sera	Yes	No		Different PC for detection and identification Class I and II	Always -30	>48	Adsorption beads				High background
142	No						Sometimes -20	24-48	Adsorption beads				High background
143	No						Always -20	>48					
147	Yes	Sensitised patient sera	Yes	Yes		For each series HLA Antibody detection	Yes 4	>48	Adsorption beads				
154	Yes	Sensitised patient sera	Yes	No		Screening = Pos Class I and II serum	Yes 4	>48					
159													
160	No					Not requested	Always 4-6	>48	Adsorption beads				
162	No		No	Not requested	No	Not requested	Always -20	24-48	EDTA				
163	Yes	Sensitised patient sera	Yes	No		Kit Dependent	Always -30	>48	EDTA, Adsorption beads				
164	Yes	Sensitised patient sera	Yes	Yes			Sometimes 5	>48					
169	No						Always -20	>48			Dilution		
181	Yes	Sensitised patients pool	Yes	No		One for Class I and one for Class II	Always Frozen	>48	Adsorption beads		Dilution		
186	Yes	Manufacturer	Yes	No			Yes Frozen	24-48	Adsorption beads				
189	Yes	Manufacturer	Yes	No		Kit Dependent	Sometimes 2-8	24-48					
190	Yes	Manufacturer	Yes	No		Kit Dependent	Yes -40	>48					
191	Yes	Pooled sensitised patient sera	Yes	Yes			Always -20	<24	Adsorption beads		Dilution		
193	Yes	Sensitised patient sera	Yes	Yes			Always -35	24-48			DTT		
194	Yes	Sensitised donor sera	Yes	Yes			Sometimes Frozen	>48					
195													
204	Yes	Pooled sensitised patient	Yes	Yes			Always -20	>48	EDTA, Adsorption beads				High background
205	Yes	Sensitised patient sera, Manufacturer	Yes	Yes			Sometimes Fridge	>48			Dilution		High background
206	Yes	Sensitised patient sera, Manufacturer	Yes	No		Kit Dependent	Yes -30	<24	Adsorption beads				
209	Yes	Sensitised patient sera, NIBSC	Yes	No		Strong PC used for all Luminex, low pos for antibody detection	Always -30	>48					
212	Yes	Kit Dependent	Yes	No			Always 4	24-48			Dilution		High background
214	Yes	Manufacturer	Yes	Yes			Always -30	>48			Dilution		High CONs
227	Yes	Sensitised patient sera	Yes	Yes			Always -40	>48	EDTA		Dilution		
229	Yes	Manufacturer	Yes	No		Kit Dependent	Always -80	>48	Adsorption beads				
230	Yes	Kit Dependent	Yes	Yes			Always -20	24-48					
231	No						No						
232	Yes	Manufacturer	Yes	Yes		Kit Dependent	Yes -60	>48					
238	Yes	Pool of immunised patient sera	Yes	Yes			Always 2-5	<24	EDTA				
239	Yes	Manufacturer	Yes	Yes			Yes 4	>48					
240	Yes	Manufacturer	Yes	No		Kit Dependent	Always -20	>48					
242	No						Always -25	>48					
245	Yes	Pooled sensitised patient sera	Yes	No		Screening only	Always -25	24-48	EDTA, Adsorption beads				High background
252	Yes	Manufacturer	Yes	No		Kit Dependent	Yes -20	>48					
254													
259	Yes	Manufacturer	Yes	Yes			Sometimes 24	24-48			Dilution		High background
262	Yes	Immunized platelet donor	Yes	Yes			No 20	24-48					
264	Yes		Yes	Yes			Always 20	>48					
268													
273	Yes	Sensitised patients	Yes	Yes			Always 4	24-48	Adsorption beads				
277	Yes	UK NEQAS 2015 sera	No	Yes		Kit Dependent	Yes <=30	24-48	EDTA, Adsorption beads				
284	Yes	Sensitised patient sera	Yes	Yes			Always -30	>48	EDTA, Adsorption beads		Another frozen cycle		NC >500 = adsorb out, PC <5000 = frozen cycle
292	Yes	Sensitised patient sera	Yes	No		Kit Dependent	Always -30	>48	Adsorption beads				High background
293	No						Yes -70	>48	Heat inactivation, Adsorption beads				High MFI value
294	Yes	Manufacturer	Yes	Yes			Always -20	24-48	Adsorption beads				
297	Yes	Sensitised patient	Yes	No			Yes -20	>48	Adsorption beads				
302	Yes	Sensitised patient	Yes	Yes			Always 2-8	>48					
303	Yes	Sensitised patient	Yes	Yes			Always -20	>48	Heat inactivation, EDTA, Adsorption beads				NC >500MFI = adsorb out, PC <5000MFI = Heat inactivation
309	Yes	Manufacturer	Yes	No		Kit Dependent	No						
311	Yes	Patient sera	Yes	Yes			Always -80	>48	EDTA, Adsorption beads				
315	Yes	Sensitised patient sera	Yes	Yes			Yes 2-4	24-48	Adsorption beads				
318	Yes	Manufacturer	Yes	No		Kit Dependent	Sometimes 2-8	24-48					
322													
323	Yes	Sensitised patient sera	Yes	Yes			Sometimes -80	>48	EDTA		Dilution		

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LUMINEX TECHNIQUE INFORMATION - Ctd

Lab No	Incubation times? Manufacturers Instruction	Other	Wash step details		First wash step		Second wash step		Buffer removed by	Software	Min bead count	Data analysis		High background criteria
			Wash medium	Anything added	Washes	Volume (µl)	Washes	Volume (µl)				Min pos control bead MFI		
9	Yes		Supplied		5	200	5	200	Vacuum Manifold	Fusion	50	500	NC >500	
11	Yes		Supplied		3	200	2	200	Centrifuge	Fusion	50	1000	>1000MFI	
12	Yes		Supplied	Distilled water	5	175	5	175	Vacuum Manifold	Fusion	50	500	NC >500	
14	Yes		Supplied	EDTA	3	200	2	200	Centrifuge	Fusion	50	5000	Neg MFI >500, Pos/Neg ratio <2	
15	Yes		Supplied	EDTA	3	200	5	200	Vacuum Manifold	Fusion	50	PC/NC >2	NC >1500	
19	Yes		Supplied		5	200	5	200	Vacuum Manifold	Fusion	50	5000	1000-1500MFI	
20	Yes		Supplied		5	200	4	200	Vacuum Manifold	Fusion	50	2000	NC >500MFI	
23	Yes		Supplied		2	200	2	200	LabXpress	Fusion	50	500	>1500	
24	Yes		Supplied		PRA=5, LC=4	OL=200, LC=1x100, 3x25	PRA=5, LC=0	200	Vacuum Manifold	MatchIT, Fusion	PRA=500, LC=60	PRA=3000, LC=3500	PRA=NC>500, LC=Lot Dependent	
25	Yes		Supplied		5	220	5	220	Vacuum Manifold	Fusion	150	>500	NC >500	
26	Yes		Supplied	EDTA	5	200	5	200	Vacuum Manifold	Fusion	50	5000	NC >750	
28	Yes		Supplied		4	100	4	100	Vacuum Manifold	Fusion	30	500	NC >500	
29	Yes		Supplied		1	100	3	250	Vacuum Manifold	MatchIT	100	≥10000	Manufacturer	
34	Yes		Supplied		5	200	5	200	Vacuum Manifold	Fusion	50	>500 and >x2 NC	NC >500	
38	Yes	Rapid technique	Supplied		3	200	3	200	Centrifuge	Fusion	50	1500	500	
39	Yes		Supplied	EDTA	5	200	5	200	Vacuum Manifold	Fusion	50	5000	NC >500	
41	Yes		Supplied		4	200	4	200	Vacuum Manifold	Fusion	50	1500		
42	Yes		Supplied		3	200	3	200	Vacuum Manifold	Fusion	50	2000	NC >1500	
45	Yes		Supplied		4	200	4	200	Vacuum Manifold	Fusion	50	5000		
48	Yes		Supplied		3	250	3	150, 250	Vacuum Manifold	MatchIT, Fusion	50	1000, 10000	Kit Dependent	
51	Yes		Supplied		5	250	5	250	Vacuum Manifold	MatchIT, Fusion	50	5000	>500	
54	Yes		Supplied		3	150	3	150	Centrifuge	Fusion	40	1000	MC >500	
58	Yes		Supplied	Kit Dependent	Kit Dependent	Kit Dependent	Kit Dependent	Kit Dependent	Vacuum Manifold	MatchIT, Fusion	40	Kit Dependent	Kit Dependent	
62	Yes		Supplied		5	200	5	200	Vacuum Manifold	Fusion	200	500	>500	
100	Yes		Supplied		3	250			Vacuum Manifold	MatchIT	50	10000MFI control serum	3 control beads above normal range	
101	Yes		Supplied						Centrifuge	Fusion	100	4000	>500	
112	Yes		Supplied		1	100	3	250	Vacuum Manifold	MatchIT	60	12000	Kit Dependent	
114	Yes		Supplied	EDTA	3	160	2	160	Centrifuge	Fusion	50		NC >500	
115	Yes													
117	Yes		Supplied		3	200	3	200	Centrifuge	Fusion	50	500	raw data of NC 300-400	
120	Yes		Supplied		3	150	2	200	Centrifuge	Fusion	50	4000	NC >500MFI	
127	Yes		Supplied		3	200	2	200	Centrifuge	Fusion	80	NC <500 and PC/NC >x2	High NC	
128	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	500	PC/NC <2	
133	Yes		Supplied		3	250	3	250	Vacuum Manifold	MatchIT	60	10000	>1000	
136	Yes		Supplied		3		2		Centrifuge	Fusion	50	100	>500MFI	
139	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	5000	NC >500	
142	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	5000	NC >1500MFI	
143	Yes		Supplied		3	150	2	200	Centrifuge	Fusion	100	3000	NC >300MFI	
147	Yes		Supplied		4	250	4	250	Vacuum Manifold	Fusion	50	2000	>500	
154	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	1500	NC >500MFI	
159	Yes		Supplied		3	150	2	200	Centrifuge	Fusion	100	5000		
160	Yes		Supplied	EDTA	3	200	2	200	Centrifuge	Fusion	50	1500	NC >500MFI	
163	Yes		Supplied	EDTA	4	175	4	175	Vacuum Manifold	Fusion	50	4000	500	
164	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	>500	NC >1500	
169	Yes		Supplied		2	150	1	150	Centrifuge	Fusion	50	500	NC >500	
181	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	5000	High NC	
186	Yes		Supplied		3	250	3	250	Vacuum Manifold	MatchIT	10000		No criteria	
189	Yes		Supplied		1	100	3	250	Vacuum Manifold	MatchIT				
190	Yes		Supplied		3	200	2	200	Centrifuge	Fusion	100	3000	r >2 or NC <1500	
191	Yes		Supplied		3	150	3	150	Centrifuge	Fusion	100	raw data PC >1000	NC <500	
193	Yes		Supplied		3	200	2	200	Vacuum Manifold	MatchIT, Fusion	100		raw data NC >500	
194	Yes		Supplied											
195	Yes		Supplied		4	175	4	175	Vacuum Manifold	Fusion	50	PC >5000	NC >500	
204	Yes		Supplied		1	150	4	100	Vacuum Manifold	MatchIT	60	PC ≥10000	>1000	
206	Yes		Supplied		1	100	3	250	Vacuum Manifold	MatchIT	100	Sera >3500, PC >10000	Kit Dependent	
209	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	3000	NC >500MFI	
212	Yes		Supplied		1	100	2	250	Vacuum Manifold	MatchIT	60	≥10000	>1000MFI	
214	Yes		Supplied		3	250	5	175	Vacuum Manifold	MatchIT	60	≥10000	>1000MFI	
227	Yes		Supplied		5	175	5	175	Vacuum Manifold	MatchIT, Fusion	50	1500 raw	≤500 raw	
229	Yes		Supplied		1	150	3	250	Vacuum Manifold	MatchIT	>300	>10000		
230	Yes		Supplied		1				Vacuum Manifold	MatchIT	1000	1000	>1000MFI	
231	Yes		Supplied		1	100	3	250	Vacuum Manifold	Luminex	500	1500		
232	Yes		Supplied		4	250			Vacuum Manifold	MatchIT	1000	5000	Internal control values	
238	Yes		Supplied		1	100	3	250	Vacuum Manifold	MatchIT	100	3500	NC cut off range	
239	Yes		Supplied		4	100			Vacuum Manifold	MatchIT	60	≥10000	>1000MFI	
240	Yes		Supplied		3	250			Vacuum Manifold	MatchIT	60	10000	1000	
242	Yes		Supplied	Wash buffer	1	100	3	750	Vacuum Manifold	MatchIT	100	1647		
245	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	500	NC >1500	
252	Yes		Supplied		4	100			Vacuum Manifold	MatchIT				
254	Yes		Supplied											
259	Yes		Supplied		1	150	3	250	Vacuum Manifold	MatchIT	50	Kit Dependent	Kit Dependent	
262	Yes		Supplied		3	250	3	250	Vacuum Manifold	MatchIT	50	3500	Kit Dependent	
264	Yes		Supplied		3	150	2	200	Centrifuge	Fusion	100	Apr-00		
268	Yes		Supplied		4	100			Vacuum Manifold	MatchIT	60	3500		
273	Yes		Supplied		5	175	5	175	Vacuum Manifold	Fusion	50	>500	1 value outside the observed ranges	
277	Yes		Supplied		3	150	2	200	Centrifuge	Fusion	100	500, PC/NC ratio ≥2.0	NC ≥1500	
284	Yes		Supplied	EDTA	4	175	4	175	Vacuum Manifold	Fusion	50	5000	500	
292	Yes		Supplied		3	200	3	200	Centrifuge	Fusion	50	5000	NC >500	
293	Yes		Supplied		3	1000	2	1000	Centrifuge	Fusion	100	PC >500 and >x2 NC	NC >500	
294	Yes		Supplied		3	250			Vacuum Manifold	MatchIT	60	>10000 PC and NC, >3500 sample patient	Con >range	
297	Yes		Supplied		4	175	4	175	Vacuum Manifold	Fusion	50	1500	NC >500	
302	Yes		Supplied		1	250	3	250	Vacuum Manifold	MatchIT	10000	5000		
303	Yes		Supplied		3	200	3	200	Vacuum Manifold	Fusion	50	5000	NC >500MFI	
309	Yes		Supplied		3	250			Vacuum Manifold					
311	Yes		Supplied	EDTA	5	175	5	175	Vacuum Manifold	Fusion	50	4000	NC >500MFI	
315	Yes		Supplied		3	250			Vacuum Manifold	MatchIT	70-75	>3500	Con >range	
318	Yes		Supplied		1	100	3	250	Vacuum Manifold	MatchIT	100		Repeat testing	
322	Yes		Supplied											
323	Yes		Supplied		5	175			Vacuum Manifold	Fusion	50	500	Known PC and NC MFI	

UK NEQAS for H&I Scheme 6 - HLA Antibody Detection

SAMPLES 6 01-10/2016

DESPATCHED ON 26TH JANUARY 2016

IgG Results - Additional Information

Lab No.	Methods used to test these samples:		Apply to all?	If No, details	Have the samples been treated?	Apply to all?	If No, details	Please list any samples that gave "high background" in Luminex assay	Further details	Comments
	C = CDC, F = Flow, E = ELISA, LSA = Luminex Single Antigen, LM Apply to = Luminex Mixed/Multi	Apply to all?								
9	LSA, LM	Yes			No treatment	Yes				
11	LM	Yes			No treatment	Yes				
12	LM	Yes			Adsorb Out/Sera Clean Beads	No	601+607			
14	LSA, LM	No		601-610 by LM 601 + 603-606 LSA also	Heat Inactivation, EDTA	No	601-610 EDTA 601+603-606 heat treated before SA	601, 607	601 high background not removed by Adsorb out treatment 607 high background removed by Adsorb out treatment	
15	LM	Yes			EDTA	Yes				
19	LM	Yes			No treatment	Yes				
20	C, LM	Yes			EDTA	Yes				
23	LM	Yes			No treatment	No	606 EDTA			
24	LM	Yes			No treatment	Yes				
25	LSA, LM	Yes		601+605 One Lambda SABI also to confirm positivity	EDTA	Yes				
26	LM	Yes			No treatment	No	604 EDTA			
28	LM	Yes			No treatment	Yes				
29	C, LSA, LM	No		601, 602, 605, 606, 608+609 by LM 603, 604, 607+610 C, LSA AND LM	Adsorb Out/Sera Clean Beads	No	609	609	The high background was removed by treatment of the sample with Seraclean	
34	LM	No		604 tested by SAB and ID as inconclusive on screens. B63 antibody present	No treatment	Yes				
38	LM	Yes			EDTA	Yes				
39	LM	Yes			Adsorb Out/Sera Clean Beads	No	607	607	The high background was removed by Adsorb Oout treatment	
41	LM	Yes			No treatment	Yes				
42	LM	Yes			EDTA	Yes				
45	LM	Yes			Adsorb Out/Sera Clean Beads	Yes				
48	LM	Yes			No treatment	Yes				
51	LSA, LM	No		605 LSA	EDTA	Yes	605 FOR LSA			
54	LM	Yes			No treatment	Yes				
58	LM	Yes			No treatment	Yes				
62	LM	Yes			No treatment	Yes				
100	LM	Yes			No treatment	Yes				
101	C, LM	Yes			No treatment	Yes				
112	LSA, LM	No		601-610 LM 601+606 LSA I 609 LSA II	No treatment	Yes				
114	C, LM	Yes			No treatment	Yes				
115	F, LM	Yes			No treatment	Yes				
117	E, LM	Yes			No treatment	Yes				
120	C, LM	Yes			EDTA	Yes				
127	LM	Yes			No treatment	Yes				
128	LM	Yes			No treatment	Yes				
133	Only performed screening test	Yes			No treatment	Yes				
136	C, LM	Yes			Adsorb Out/Sera Clean Beads	No	601+608	601+608	in Part	
139	LM	Yes			No treatment	Yes				
142	LM	Yes			No treatment	Yes				
143	LM	Yes			No treatment	Yes				
147	LM	Yes			No treatment	Yes				
153	F	Yes			No treatment	Yes				
154	C, LM	Yes			No treatment	Yes				
159	C, LM	Yes			No treatment	Yes				
160	LSA, LM	No		601-610 LM 601+605 LSA I 610 LSA II	Adsorb Out/Sera Clean Beads	Yes				LSAs run to clarify ambiguous mixed beads results
162	LM	Yes			EDTA	Yes				
163	LM	Yes			EDTA	Yes				
164	LM	Yes			No treatment	Yes				
169	LM	Yes			Dilution	Yes				
181	LM	Yes			No treatment	Yes				
186	C, LM	Yes			No treatment	Yes				
189	LM	Yes			No treatment	Yes				
190	LM	Yes			No treatment	Yes				
191	LM	Yes			DTT	Yes				
193	LM	Yes			No treatment	Yes				
194	LM	Yes			DTT	Yes				
195	LM	Yes			No treatment	Yes				601+605 weak positive for HLA Class I
204	LM	Yes			EDTA	Yes				
205	LM	Yes			No treatment	Yes				
206	C, LM	Yes			No treatment	Yes				
209	LM	Yes			No treatment	Yes				
212	LM	Yes			No treatment	Yes				
214	LM	Yes			No treatment	Yes				
223	C	Yes			No treatment	Yes				
227	C, LSA, LM	Yes			No treatment	Yes				
229	LM	Yes			Adsorb Out/Sera Clean Beads	No	601, 603, 604, 605, 606, 609	601, 603, 604, 605, 606, 609	The SeraClean test should be applied for the high background samples	Each samples results should be evaluated together with immunisation information. It has a low positive and if there is no immunisation information should be evaluated as a negative result.
230	Luminex fluorescence	Yes			No treatment	Yes				
231	LM	Yes			No treatment	Yes				
232	LSA, LM	Yes			No treatment	Yes				
238	C, LSA, LM	No		LSA made when "grey zone" is found for antibody detection	DTT for CDC	Yes				
239	LM	Yes			No treatment	Yes				
240	LM	Yes			No treatment	Yes				
242	LM	Yes			No treatment	Yes				
245	C, LM	Yes			DTT, EDTA	Yes	DTT for CDC, EDTA for Luminex			
252	LM	Yes			No treatment	Yes				
254	LM	Yes			No treatment	Yes				
259	LM	Yes			No treatment	Yes				
262	LM	Yes			No treatment	Yes				
264	LM	Yes			No treatment	Yes				
268	C, LM	Yes			DTT for CDC	Yes				
273	LM	Yes			No treatment	Yes				CDC only performed on T cells
277	LM	Yes			EDTA	Yes				
284	C, LM	Yes			EDTA	Yes				
292	LM	Yes			No treatment	Yes				
293	LM	Yes			No treatment	Yes				
294	C, LM	Yes			No treatment	Yes				
297	LM	Yes			No treatment	Yes				
302	LM	Yes			No treatment	Yes				
303	LM	Yes			EDTA	Yes				
309	LM	Yes			No treatment	Yes				
311	C, LM	No		601-605: L 606-610: CDC	EDTA	No	601-605			
315	C, LM	Yes			Adsorb Out/Sera Clean Beads	No	609	609	The high background removed by Seraclean treatment	
318	LM	Yes			No treatment	Yes				
322	LM	Yes			No treatment	Yes				
323	LM	Yes			EDTA	Yes				
335	F	Yes			No treatment	Yes				

UK NEQAS for H&I Scheme 6 - HLA Antibody Detection

SAMPLES 6 01-05/2016

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Lab	601/2016				602/2016				603/2016				604/2016				605/2016			
	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method
38	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Positive	L	Positive	L	Negative	L
42	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
54	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Positive	L	Negative	L	Negative	L	Negative	L
101	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
120	Negative	C	Negative	C	Negative	C	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	Negative	C	Negative	C
139	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
154	Negative	C	NT	NT	Negative	C	NT	NT	Positive	C	NT	NT	Positive	C	NT	NT	Negative	C	NT	NT
159	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
162	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Positive	L	Negative	L	Negative	L
186	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Positive	C	NT	NT
194	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
206	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
227	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
238	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
245	Negative	NT	NT	NT	Negative	NT	NT	NT	Negative	NT	NT	NT	Negative	NT	NT	NT	Negative	NT	NT	NT
268	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
284	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
311	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT	NT
315	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT

UK NEQAS for H&I Scheme 6 - HLA Antibody Detection

SAMPLES 6 06-10/2016

DESPATCHED ON 26TH JANUARY 2016

Lab	606/2016				607/2016				608/2016				609/2016				610/2016			
	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method	CI I IgM	CI I Method	CI II IgM	CI II Method
38	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L
42	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
54	Positive	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Positive	L	Negative	L	Negative	L	Negative	L
101	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
120	Negative	C	Negative	C	Negative	C	Negative	C	Negative	C	Negative	C	Negative	C	Negative	C	Negative	C	Negative	C
139	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
154	Negative	C	NT	NT	Negative	C	NT	NT	Positive	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
159	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
162	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Negative	L	Positive	L	Negative	L	Negative	L	Negative	L
186	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
194	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
206	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
227	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
238	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
245	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
268	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
284	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
311	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT
315	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT	Negative	C	NT	NT

UK NEQAS for H&I Scheme 6 - HLA Antibody Detection

SAMPLES 6 01-10/2016

DESPATCHED ON 26TH JANUARY 2016

IgG Results - Additional Information

Lab No.	Methods used to test these samples:				Have the samples been treated?	Apply to all?	If No, details	Please list any samples that gave "high background" in Luminex assay	
	C = CDC, F = Flow, E = ELISA, LSA = Luminex Single Antigen, LM = Luminex Mixed/Multi	Apply to all?	If No, details	Luminex assay				Further details	
38	LM	Yes		EDTA	Yes		601, 602, 603, 606		
42	C			EDTA					
	LM	Yes		Adsorb Out/SeraClean Beads	No	NC value >500, 610 only		Still gave high background with 610 Adsorb Out	
54				No treatment					
139	C	Yes		2-mercapto-ethanol reduction	No	603, 604, 608			
154	C	Yes		No treatment	Yes				
159	C, LM	Yes		EDTA	Yes				
162	LM	Yes		No treatment	Yes				
186	C	Yes		DTT	Yes				
194	C	Yes		No treatment	Yes				
206	C	Yes		DTT	Yes				
227	C	Yes		DTT	Yes				
238	C	Yes		DTT	Yes				
268	C, LSA	Yes		DTT for CDC	Yes			CDC only performed on T cells	
284	C	Yes		DTT	Yes				
311	C	No	606-610	DTT					
315	C, LM	Yes		Adsorb Out/SeraClean Beads	No	609		609 Seraclean treatment	

UK NEQAS for H&I Scheme 6 - HLA Antibody Detection

CDC % PRA OF 6 01-10/2016

DESPATCHED ON 26TH JANUARY 2016

Lab no.	T-cell CDC % PRA	B-cell CDC % PRA	PBL CDC % PRA	601/2016			602/2016			603/2016			604/2016			605/2016			606/2016			607/2016			608/2016			609/2016			610/2016							
				T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL	T-cell	B-cell	PBL					
20	0	41	0		41			68			0			44			41			0			0				37			7			0					
42			40			3			8			0			10			3			0			0				10			0			0				
120	36	36		0	43	0	45					0	68		0	0			0	0		0			3	26			0	0		0	0		0	0		
136			45			7			11					16			7			0			0			11			0			0			0	0		
154				0			0			0 IgG 20 IgM			0 IgG 7 IgM			0			0			0			3 IgG 17 IgM			0			0			0	0			
159						0			10			0		0			0			0			0			13			0			0			0	0		
186			34			23			9			0		20			9			0			0			15			0			0			0	0		
194						8			0			0		0			0			0			0			8			0			0			0	0		
206			30			0			0			0		0			0			0			0			16			0			0			0	0		
227			30			0			0			0		0			0			0			0			16			0			0			0	0		
238			40			5			7			0		0			0			0			0			13			0			0			0	0		
245																																						
268	30			0			0					0							0					4										0			0	0
284			30			0			0			0		0			0			0			0			16			0			0			0	0		
311			60			NT			NT			NT		NT			NT			0			0			3			0			12			0	0		
315	30			0			0					0							0															0			0	0