

Summary statistics - qualitative results

(Groups: manufacturer of kit)

EQA round: IH4/22 - Blood Group Serology

Deadline: 18.11.2022

Key: >>> ... marks correct (expected) result

N ... number of the results

> ... marks conditionally correct (acceptable) result

Nrel ... relative number of the results

± ... marks the result not evaluated

Test

Sample	Group	N	Result	N _{rel}
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Set 1 and 2**(700) ABO blood group**

E1 and S1 (6) APR	>>>	3	Blood group: A	1,9 %
(14) Bio-Rad	>>>	50	Blood group: A	31 %
(40) Ortho Clinical Diagnostics	>>>	2	Blood group: A	1,2 %
(52) Dynex	>>>	2	Blood group: A	1,2 %
(64) Exbio Olomouc	>>>	7	Blood group: A	4,3 %
(80) DiaMed	>>>	14	Blood group: A	8,6 %
		1	Blood group: B	0,62 %
(159) Grifols	>>>	41	Blood group: A	25 %
(172) Immucor	>>>	21	Blood group: A	13 %
(173) Sanguin	>>>	8	Blood group: A	4,9 %
(174) IVT Imuno	>>>	7	Blood group: A	4,3 %
(203) ANTITOXIN	>>>	2	Blood group: A	1,2 %
(999) another manufacturer	>>>	4	Blood group: A	2,5 %
Total per sample: n = 162	—	Success: 99 %	—	
E2 and S2 (6) APR	>>>	3	Blood group: 0	1,9 %
(14) Bio-Rad	>>>	50	Blood group: 0	31 %
(40) Ortho Clinical Diagnostics	>>>	2	Blood group: 0	1,2 %
(52) Dynex	>>>	2	Blood group: 0	1,2 %
(64) Exbio Olomouc	>>>	7	Blood group: 0	4,3 %
(80) DiaMed	>>>	14	Blood group: 0	8,6 %
		1	Blood group: A	0,62 %
(159) Grifols	>>>	41	Blood group: 0	25 %
(172) Immucor	>>>	21	Blood group: 0	13 %
(173) Sanguin	>>>	8	Blood group: 0	4,9 %
(174) IVT Imuno	>>>	7	Blood group: 0	4,3 %
(203) ANTITOXIN	>>>	2	Blood group: 0	1,2 %
(999) another manufacturer	>>>	4	Blood group: 0	2,5 %
Total per sample: n = 162	—	Success: 99 %	—	

Total success: 99 %

(703) A subgroup

E1 and S1 (0) not specified	>>>	51	A subgroup A1	100 %
Total per sample: n = 51	—	Success: 100 %	—	
E2 and S2 (0) not specified	>>>	51	Not specified	100 %
Total per sample: n = 51	—	Success: 100 %	—	

Total success: 100 %

(705) Rh D antigen (blood-donor)

E1 and S1 (0) not specified	>>>	1	Positive (RhD+)	1,1 %
(6) APR	>>>	4	Positive (RhD+)	4,2 %
(14) Bio-Rad	>>>	29	Positive (RhD+)	31 %
(40) Ortho Clinical Diagnostics	>>>	1	Positive (RhD+)	1,1 %
(52) Dynex	>>>	1	Positive (RhD+)	1,1 %
(64) Exbio Olomouc	>>>	3	Positive (RhD+)	3,2 %
(80) DiaMed	>>>	4	Positive (RhD+)	4,2 %
(159) Grifols	>>>	19	Positive (RhD+)	20 %
(172) Immucor	>>>	22	Positive (RhD+)	23 %
(173) Sanguin	>>>	4	Positive (RhD+)	4,2 %
(174) IVT Imuno	>>>	3	Positive (RhD+)	3,2 %
(203) ANTITOXIN	>>>	2	Positive (RhD+)	2,1 %
(999) another manufacturer	>>>	2	Positive (RhD+)	2,1 %
Total per sample: n = 95	—	Success: 100 %	—	
E2 and S2 (0) not specified	>>>	1	Negative (RhD-)	1,1 %
(6) APR	>>>	4	Negative (RhD-)	4,2 %
(14) Bio-Rad	>>>	29	Negative (RhD-)	31 %
(40) Ortho Clinical Diagnostics	>>>	1	Negative (RhD-)	1,1 %
(52) Dynex	>>>	1	Negative (RhD-)	1,1 %
(64) Exbio Olomouc	>>>	3	Negative (RhD-)	3,2 %
(80) DiaMed	>>>	4	Negative (RhD-)	4,2 %
(159) Grifols	>>>	19	Negative (RhD-)	20 %
(172) Immucor	>>>	22	Negative (RhD-)	23 %
(173) Sanguin	>>>	4	Negative (RhD-)	4,2 %
(174) IVT Imuno	>>>	3	Negative (RhD-)	3,2 %
(203) ANTITOXIN	>>>	2	Negative (RhD-)	2,1 %

Summary statistics - qualitative results

(Groups: manufacturer of kit)

EQA round: IH4/22 - Blood Group Serology

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Test

Sample	Group	N	Result	N _{rel}
E2 and S2 (999) another manufacturer		>>> 2	Negative (RhD-)	2,1 %
Total per sample: n = 95	—	Success: 100 %	—	
Total success: 100 %				

(709) Rh D antigen (recipient)

E1 and S1 (6) APR		>>> 3	Positive (RhD+)	2,0 %
(14) Bio-Rad		>>> 46	Positive (RhD+)	30 %
(40) Ortho Clinical Diagnostics		>>> 2	Positive (RhD+)	1,3 %
(50) Merck		>>> 1	Positive (RhD+)	0,66 %
(52) Dynex		>>> 2	Positive (RhD+)	1,3 %
(64) Exbio Olomouc		>>> 6	Positive (RhD+)	3,9 %
(80) DiaMed		>>> 1	Negative (RhD-)	0,66 %
		>>> 11	Positive (RhD+)	7,2 %
(159) Grifols		>>> 40	Positive (RhD+)	26 %
(172) Immucor		>>> 22	Positive (RhD+)	14 %
(173) Sanguin		>>> 5	Positive (RhD+)	3,3 %
(174) IVT Imuno		>>> 6	Positive (RhD+)	3,9 %
(203) ANTITOXIN		>>> 2	Positive (RhD+)	1,3 %
(999) another manufacturer		>>> 5	Positive (RhD+)	3,3 %
Total per sample: n = 152	—	Success: 99 %	—	
E2 and S2 (6) APR		>>> 3	Negative (RhD-)	2,0 %
(14) Bio-Rad		>>> 46	Negative (RhD-)	30 %
(40) Ortho Clinical Diagnostics		>>> 2	Negative (RhD-)	1,3 %
(50) Merck		>>> 1	Negative (RhD-)	0,66 %
(52) Dynex		>>> 2	Negative (RhD-)	1,3 %
(64) Exbio Olomouc		>>> 6	Negative (RhD-)	3,9 %
(80) DiaMed		>>> 12	Negative (RhD-)	7,9 %
(159) Grifols		>>> 40	Negative (RhD-)	26 %
(172) Immucor		>>> 22	Negative (RhD-)	14 %
(173) Sanguin		>>> 5	Negative (RhD-)	3,3 %
(174) IVT Imuno		>>> 6	Negative (RhD-)	3,9 %
(203) ANTITOXIN		>>> 2	Negative (RhD-)	1,3 %
(999) another manufacturer		>>> 5	Negative (RhD-)	3,3 %
Total per sample: n = 152	—	Success: 100 %	—	
Total success: 99 %				

(715) Antigen C

E1 and S1 (6) APR		>>> 1	Positive	1,2 %
(14) Bio-Rad		>>> 33	Positive	40 %
(50) Merck		>>> 1	Positive	1,2 %
(64) Exbio Olomouc		>>> 1	Positive	1,2 %
(80) DiaMed		>>> 6	Positive	7,3 %
(159) Grifols		>>> 18	Positive	22 %
(172) Immucor		>>> 14	Positive	17 %
(173) Sanguin		>>> 2	Positive	2,4 %
(174) IVT Imuno		>>> 2	Positive	2,4 %
(203) ANTITOXIN		>>> 3	Positive	3,7 %
(999) another manufacturer		>>> 1	Positive	1,2 %
Total per sample: n = 82	—	Success: 100 %	—	
E2 and S2 (6) APR		>>> 1	Negative	1,2 %
(14) Bio-Rad		>>> 33	Negative	40 %
(50) Merck		>>> 1	Negative	1,2 %
(64) Exbio Olomouc		>>> 1	Negative	1,2 %
(80) DiaMed		>>> 6	Negative	7,3 %
(159) Grifols		>>> 18	Negative	22 %
(172) Immucor		>>> 14	Negative	17 %
(173) Sanguin		>>> 2	Negative	2,4 %
(174) IVT Imuno		>>> 2	Negative	2,4 %
(203) ANTITOXIN		>>> 3	Negative	3,7 %
(999) another manufacturer		>>> 1	Negative	1,2 %
Total per sample: n = 82	—	Success: 100 %	—	
Total success: 100 %				

(716) Antigen c

E1 and S1 (6) APR		>>> 1	Negative	1,2 %
(14) Bio-Rad		>>> 33	Negative	40 %
(50) Merck		>>> 1	Negative	1,2 %
(64) Exbio Olomouc		>>> 1	Negative	1,2 %
(80) DiaMed		>>> 6	Negative	7,3 %
(159) Grifols		>>> 18	Negative	22 %

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Test

Sample	Group	N	Result	N _{rel}
E1 and S1 (172)	Immucor	>>>	14 Negative	17 %
(173)	Sanguin	>>>	2 Negative	2,4 %
(174)	IVT Imuno	>>>	2 Negative	2,4 %
(203)	ANTITOXIN	>>>	3 Negative	3,7 %
(999)	another manufacturer	>>>	1 Negative	1,2 %
Total per sample: n = 82		Success:	100 %	-
E2 and S2 (6)	APR	>>>	1 Positive	1,2 %
(14)	Bio-Rad	>>>	33 Positive	40 %
(50)	Merck	>>>	1 Positive	1,2 %
(64)	Exbio Olomouc	>>>	1 Positive	1,2 %
(80)	Diamed	>>>	6 Positive	7,3 %
(159)	Grifols	>>>	18 Positive	22 %
(172)	Immucor	>>>	14 Positive	17 %
(173)	Sanguin	>>>	2 Positive	2,4 %
(174)	IVT Imuno	>>>	2 Positive	2,4 %
(203)	ANTITOXIN	>>>	3 Positive	3,7 %
(999)	another manufacturer	>>>	1 Positive	1,2 %
Total per sample: n = 82		Success:	100 %	-

Total success: 100 %

(717) Antigen Cw

E1 and S1 (6)	APR	>>>	1 Negative	1,5 %
(14)	Bio-Rad	>>>	22 Negative	34 %
(50)	Merck	>>>	1 Negative	1,5 %
(64)	Exbio Olomouc	>>>	1 Negative	1,5 %
(80)	Diamed	>>>	1 Negative	1,5 %
(159)	Grifols	>>>	18 Negative	28 %
(172)	Immucor	>>>	13 Negative	20 %
(173)	Sanguin	>>>	2 Negative	3,1 %
(174)	IVT Imuno	>>>	4 Negative	6,2 %
(203)	ANTITOXIN	>>>	2 Negative	3,1 %
Total per sample: n = 65		Success:	100 %	-
E2 and S2 (6)	APR	>>>	1 Negative	1,5 %
(14)	Bio-Rad	>>>	22 Negative	34 %
(50)	Merck	>>>	1 Negative	1,5 %
(64)	Exbio Olomouc	>>>	1 Negative	1,5 %
(80)	Diamed	>>>	1 Negative	1,5 %
(159)	Grifols	>>>	18 Negative	28 %
(172)	Immucor	>>>	13 Negative	20 %
(173)	Sanguin	>>>	2 Negative	3,1 %
(174)	IVT Imuno	>>>	4 Negative	6,2 %
(203)	ANTITOXIN	>>>	2 Negative	3,1 %
Total per sample: n = 65		Success:	100 %	-

Total success: 100 %

(718) Antigen E

E1 and S1 (6)	APR	>>>	1 Negative	1,2 %
(14)	Bio-Rad	>>>	33 Negative	40 %
(50)	Merck	>>>	1 Negative	1,2 %
(64)	Exbio Olomouc	>>>	1 Negative	1,2 %
(80)	Diamed	>>>	6 Negative	7,3 %
(159)	Grifols	>>>	18 Negative	22 %
(172)	Immucor	>>>	14 Negative	17 %
(173)	Sanguin	>>>	2 Negative	2,4 %
(174)	IVT Imuno	>>>	2 Negative	2,4 %
(203)	ANTITOXIN	>>>	3 Negative	3,7 %
(999)	another manufacturer	>>>	1 Negative	1,2 %
Total per sample: n = 82		Success:	100 %	-
E2 and S2 (6)	APR	>>>	1 Negative	1,2 %
(14)	Bio-Rad	>>>	33 Negative	40 %
(50)	Merck	>>>	1 Negative	1,2 %
(64)	Exbio Olomouc	>>>	1 Negative	1,2 %
(80)	Diamed	>>>	6 Negative	7,3 %
(159)	Grifols	>>>	18 Negative	22 %
(172)	Immucor	>>>	14 Negative	17 %
(173)	Sanguin	>>>	2 Negative	2,4 %
(174)	IVT Imuno	>>>	2 Negative	2,4 %
(203)	ANTITOXIN	>>>	3 Negative	3,7 %
(999)	another manufacturer	>>>	1 Negative	1,2 %
Total per sample: n = 82		Success:	100 %	-

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Test

Sample	Group	N	Result	N _{rel}
Total success: 100 %				
(719) Antigen e				
E1 and S1 (6) APR				
(14) Bio-Rad	>>>	1	Positive	1,2 %
(17) Biogema	>>>	32	Positive	39 %
(50) Merck	>>>	1	Positive	1,2 %
(64) Exbio Olomouc	>>>	1	Positive	1,2 %
(80) DiaMed	>>>	6	Positive	7,3 %
(159) Grifols	>>>	18	Positive	22 %
(172) Immucor	>>>	14	Positive	17 %
(173) Sanguin	>>>	2	Positive	2,4 %
(174) IVT Imuno	>>>	2	Positive	2,4 %
(203) ANTITOXIN	>>>	3	Positive	3,7 %
(999) another manufacturer	>>>	1	Positive	1,2 %
Total per sample: n = 82	-----	Success: 100 %	-	
E2 and S2 (6) APR				
(14) Bio-Rad	>>>	1	Positive	1,2 %
(17) Biogema	>>>	32	Positive	39 %
(50) Merck	>>>	1	Positive	1,2 %
(64) Exbio Olomouc	>>>	1	Positive	1,2 %
(80) DiaMed	>>>	6	Positive	7,3 %
(159) Grifols	>>>	18	Positive	22 %
(172) Immucor	>>>	14	Positive	17 %
(173) Sanguin	>>>	2	Positive	2,4 %
(174) IVT Imuno	>>>	2	Positive	2,4 %
(203) ANTITOXIN	>>>	3	Positive	3,7 %
(999) another manufacturer	>>>	1	Positive	1,2 %
Total per sample: n = 82	-----	Success: 100 %	-	
Total success: 100 %				
(720) Antigen K				
E1 and S1 (6) APR				
(14) Bio-Rad	>>>	1	Negative	1,2 %
(50) Merck	>>>	30	Negative	35 %
(80) DiaMed	>>>	1	Negative	1,2 %
(159) Grifols	>>>	6	Negative	7,1 %
(172) Immucor	>>>	22	Negative	26 %
(173) Sanguin	>>>	14	Negative	16 %
(174) IVT Imuno	>>>	3	Negative	3,5 %
(203) ANTITOXIN	>>>	4	Negative	4,7 %
(999) another manufacturer	>>>	2	Negative	2,4 %
Total per sample: n = 85	-----	Success: 100 %	-	
E2 and S2 (6) APR				
(14) Bio-Rad	>>>	1	Negative	1,2 %
(50) Merck	>>>	30	Negative	35 %
(80) DiaMed	>>>	1	Negative	1,2 %
(159) Grifols	>>>	6	Negative	7,1 %
(172) Immucor	>>>	22	Negative	26 %
(173) Sanguin	>>>	14	Negative	16 %
(174) IVT Imuno	>>>	3	Negative	3,5 %
(203) ANTITOXIN	>>>	4	Negative	4,7 %
(999) another manufacturer	>>>	2	Negative	2,4 %
Total per sample: n = 85	-----	Success: 100 %	-	
Total success: 100 %				
(721) Antigen k				
E1 and S1 (14) Bio-Rad				
(64) Exbio Olomouc	>>>	13	Positive	30 %
(80) DiaMed	>>>	5	Positive	12 %
(159) Grifols	>>>	2	Positive	4,7 %
(172) Immucor	>>>	4	Positive	9,3 %
(173) Sanguin	>>>	5	Positive	12 %
(174) IVT Imuno	>>>	7	Positive	16 %
(203) ANTITOXIN	>>>	2	Positive	4,7 %
(999) another manufacturer	>>>	4	Positive	9,3 %
Total per sample: n = 43	-----	Success: 100 %	-	
E2 and S2 (14) Bio-Rad				
(64) Exbio Olomouc	>>>	13	Positive	30 %
(80) DiaMed	>>>	5	Positive	12 %
(159) Grifols	>>>	2	Positive	4,7 %
(172) Immucor	>>>	4	Positive	9,3 %

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EQA round: IH4/22 - Blood Group Serology

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Test

Sample	Group	N	Result	N _{rel}	
E2 and S2 (172)	Immucor	>>>	5 Positive	12 %	
(173)	Sanguin	>>>	7 Positive	16 %	
(174)	IVT Imuno	>>>	2 Positive	4,7 %	
(203)	ANTITOXIN	>>>	4 Positive	9,3 %	
(999)	another manufacturer	>>>	1 Positive	2,3 %	
<hr/> Total per sample: n = 43		Success: 100 %		<hr/>	

Total success: 100 %

(722) Antigen M

E1 and S1 (6)	APR	>>>	1 Positive	2,5 %	
(14)	Bio-Rad	>>>	9 Positive	23 %	
(52)	Dynex	>>>	2 Positive	5,0 %	
(64)	Exbio Olomouc	>>>	2 Positive	5,0 %	
(80)	DiaMed	>>>	1 Positive	2,5 %	
(159)	Grifols	>>>	4 Positive	10 %	
(172)	Immucor	>>>	15 Positive	38 %	
(173)	Sanguin	>>>	2 Positive	5,0 %	
(183)	Immunodiagnostic Systems	>>>	1 Positive	2,5 %	
(203)	ANTITOXIN	>>>	3 Positive	7,5 %	
<hr/> Total per sample: n = 40		Success: 100 %		<hr/>	
E2 and S2 (6)	APR	>>>	1 Positive	2,5 %	
(14)	Bio-Rad	>>>	9 Positive	23 %	
(52)	Dynex	>>>	2 Positive	5,0 %	
(64)	Exbio Olomouc	>>>	2 Positive	5,0 %	
(80)	DiaMed	>>>	1 Positive	2,5 %	
(159)	Grifols	>>>	4 Positive	10 %	
(172)	Immucor	>>>	15 Positive	38 %	
(173)	Sanguin	>>>	2 Positive	5,0 %	
(183)	Immunodiagnostic Systems	>>>	1 Positive	2,5 %	
(203)	ANTITOXIN	>>>	3 Positive	7,5 %	
<hr/> Total per sample: n = 40		Success: 100 %		<hr/>	

Total success: 100 %

(723) Antigen N

E1 and S1 (6)	APR	>>>	1 Positive	2,7 %	
(14)	Bio-Rad	>>>	10 Positive	27 %	
(52)	Dynex	>>>	2 Positive	5,4 %	
(64)	Exbio Olomouc	>>>	1 Positive	2,7 %	
(80)	DiaMed	>>>	1 Positive	2,7 %	
(159)	Grifols	>>>	4 Positive	11 %	
(172)	Immucor	>>>	12 Positive	32 %	
(173)	Sanguin	>>>	2 Positive	5,4 %	
(183)	Immunodiagnostic Systems	>>>	1 Positive	2,7 %	
(203)	ANTITOXIN	>>>	3 Positive	8,1 %	
<hr/> Total per sample: n = 37		Success: 100 %		<hr/>	

E2 and S2 (6)	APR	>>>	1 Negative	2,7 %	
(14)	Bio-Rad	>>>	10 Negative	27 %	
(52)	Dynex	>>>	2 Negative	5,4 %	
(64)	Exbio Olomouc	>>>	1 Negative	2,7 %	
(80)	DiaMed	>>>	1 Negative	2,7 %	
(159)	Grifols	>>>	4 Negative	11 %	
(172)	Immucor	>>>	12 Negative	32 %	
(173)	Sanguin	>>>	2 Negative	5,4 %	
(183)	Immunodiagnostic Systems	>>>	1 Negative	2,7 %	
(203)	ANTITOXIN	>>>	3 Negative	8,1 %	
<hr/> Total per sample: n = 37		Success: 100 %		<hr/>	

Total success: 100 %

(724) Antigen S

E1 and S1 (6)	APR	>>>	1 Positive	2,5 %
(14)	Bio-Rad	>>>	11 Positive	28 %
(50)	Merck	>>>	1 Positive	2,5 %
(52)	Dynex	>>>	2 Positive	5,0 %
(64)	Exbio Olomouc	>>>	2 Positive	5,0 %
(80)	DiaMed	>>>	1 Positive	2,5 %
(159)	Grifols	>>>	5 Positive	13 %
(172)	Immucor	>>>	8 Positive	20 %
(173)	Sanguin	>>>	4 Positive	10 %
(174)	IVT Imuno	>>>	2 Positive	5,0 %
(203)	ANTITOXIN	>>>	3 Positive	7,5 %

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Test

Sample	Group	N	Result	N _{rel}
	Total per sample: n = 40	Success: 100 %		
E2 and S2 (6)	APR	>>> 1	Positive	2,5 %
(14)	Bio-Rad	>>> 11	Positive	28 %
(50)	Merck	>>> 1	Positive	2,5 %
(52)	Dynex	>>> 2	Positive	5,0 %
(64)	Exbio Olomouc	>>> 2	Positive	5,0 %
(80)	Diamed	>>> 1	Positive	2,5 %
(159)	Grifols	>>> 5	Positive	13 %
(172)	Immucor	>>> 8	Positive	20 %
(173)	Sanguin	>>> 4	Positive	10 %
(174)	IVT Imuno	>>> 2	Positive	5,0 %
(203)	ANTITOXIN	>>> 3	Positive	7,5 %
	Total per sample: n = 40	Success: 100 %		
Total success: 100 %				

(725) Antigen s

E1 and S1 (6)	APR	>>> 1	Positive	2,5 %
(14)	Bio-Rad	>>> 11	Positive	28 %
(52)	Dynex	>>> 1	Positive	2,5 %
(64)	Exbio Olomouc	>>> 3	Positive	7,5 %
(80)	Diamed	>>> 1	Positive	2,5 %
(159)	Grifols	>>> 5	Positive	13 %
(172)	Immucor	>>> 8	Positive	20 %
(173)	Sanguin	>>> 5	Positive	13 %
(174)	IVT Imuno	>>> 2	Positive	5,0 %
(203)	ANTITOXIN	>>> 3	Positive	7,5 %
	Total per sample: n = 40	Success: 100 %		
E2 and S2 (6)	APR	>>> 1	Positive	2,5 %
(14)	Bio-Rad	>>> 11	Positive	28 %
(52)	Dynex	>>> 1	Positive	2,5 %
(64)	Exbio Olomouc	>>> 3	Positive	7,5 %
(80)	Diamed	>>> 1	Positive	2,5 %
(159)	Grifols	>>> 5	Positive	13 %
(172)	Immucor	>>> 8	Positive	20 %
(173)	Sanguin	>>> 5	Positive	13 %
(174)	IVT Imuno	>>> 2	Positive	5,0 %
(203)	ANTITOXIN	>>> 3	Positive	7,5 %
	Total per sample: n = 40	Success: 100 %		
Total success: 100 %				

(726) Antigen P1

E1 and S1 (6)	APR	>>> 1	Positive	3,4 %
(14)	Bio-Rad	>>> 7	Positive	24 %
(64)	Exbio Olomouc	>>> 3	Positive	10 %
(80)	Diamed	>>> 1	Positive	3,4 %
(159)	Grifols	>>> 1	Positive	3,4 %
(172)	Immucor		1 Negative	3,4 %
		>>> 8	Positive	28 %
(173)	Sanguin	>>> 5	Positive	17 %
(174)	IVT Imuno	>>> 1	Positive	3,4 %
(203)	ANTITOXIN	>>> 1	Positive	3,4 %
	Total per sample: n = 29	Success: 97 %		
E2 and S2 (6)	APR	>>> 1	Positive	3,4 %
(14)	Bio-Rad	>>> 7	Positive	24 %
(64)	Exbio Olomouc	>>> 3	Positive	10 %
(80)	Diamed	>>> 1	Positive	3,4 %
(159)	Grifols	>>> 1	Positive	3,4 %
(172)	Immucor	>>> 9	Positive	31 %
(173)	Sanguin	>>> 5	Positive	17 %
(174)	IVT Imuno	>>> 1	Positive	3,4 %
(203)	ANTITOXIN	>>> 1	Positive	3,4 %
	Total per sample: n = 29	Success: 100 %		
Total success: 97 %				

(727) Antigen Fya

E1 and S1 (14)	Bio-Rad	>>> 14	Negative	34 %
(64)	Exbio Olomouc	>>> 3	Negative	7,3 %
(80)	Diamed	>>> 1	Negative	2,4 %
(159)	Grifols	>>> 5	Negative	12 %
(172)	Immucor	>>> 10	Negative	24 %
(173)	Sanguin	>>> 5	Negative	12 %

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Test

Sample	Group	N	Result	N _{rel}
E1 and S1 (174) IVT Imuno		>>>	1 Negative	2,4 %
(203) ANTITOXIN		>>>	2 Negative	4,9 %
Total per sample: n = 41	Success: 100 %			
E2 and S2 (14) Bio-Rad		>>>	14 Negative	34 %
(64) Exbio Olomouc		>>>	3 Negative	7,3 %
(80) DiaMed		>>>	1 Negative	2,4 %
(159) Grifols		>>>	5 Negative	12 %
(172) Immucor		>>>	10 Negative	24 %
(173) Sanguin		>>>	5 Negative	12 %
(174) IVT Imuno		>>>	1 Negative	2,4 %
(203) ANTITOXIN		>>>	2 Negative	4,9 %
Total per sample: n = 41	Success: 100 %			
Total success: 100 %				

(728) Antigen Fyb

E1 and S1 (14) Bio-Rad		>>>	14 Positive	34 %
(64) Exbio Olomouc		>>>	3 Positive	7,3 %
(80) DiaMed		>>>	1 Positive	2,4 %
(159) Grifols		>>>	5 Positive	12 %
(172) Immucor		>>>	9 Positive	22 %
(173) Sanguin		>>>	5 Positive	12 %
(174) IVT Imuno		>>>	1 Positive	2,4 %
(203) ANTITOXIN		>>>	3 Positive	7,3 %
Total per sample: n = 41	Success: 100 %			
E2 and S2 (14) Bio-Rad		>>>	14 Positive	34 %
(64) Exbio Olomouc		>>>	3 Positive	7,3 %
(80) DiaMed		>>>	1 Positive	2,4 %
(159) Grifols		>>>	5 Positive	12 %
(172) Immucor		>>>	9 Positive	22 %
(173) Sanguin		>>>	5 Positive	12 %
(174) IVT Imuno		>>>	1 Positive	2,4 %
(203) ANTITOXIN		>>>	3 Positive	7,3 %
Total per sample: n = 41	Success: 100 %			

Total success: 100 %

(729) Antigen Jka

E1 and S1 (6) APR		>>>	1 Negative	2,4 %
(14) Bio-Rad		>>>	12 Negative	29 %
(50) Merck		>>>	1 Negative	2,4 %
(52) Dynex		>>>	2 Negative	4,9 %
(64) Exbio Olomouc		>>>	1 Negative	2,4 %
(80) DiaMed		>>>	1 Negative	2,4 %
(159) Grifols		>>>	6 Negative	15 %
(172) Immucor		>>>	9 Negative	22 %
(173) Sanguin		>>>	5 Negative	12 %
(203) ANTITOXIN		>>>	3 Negative	7,3 %
Total per sample: n = 41	Success: 100 %			
E2 and S2 (6) APR		>>>	1 Positive	2,4 %
(14) Bio-Rad		>>>	12 Positive	29 %
(50) Merck		>>>	1 Positive	2,4 %
(52) Dynex		>>>	2 Positive	4,9 %
(64) Exbio Olomouc		>>>	1 Positive	2,4 %
(80) DiaMed		>>>	1 Positive	2,4 %
(159) Grifols		>>>	6 Positive	15 %
(172) Immucor		>>>	9 Positive	22 %
(173) Sanguin		>>>	5 Positive	12 %
(203) ANTITOXIN		>>>	3 Positive	7,3 %
Total per sample: n = 41	Success: 100 %			

Total success: 100 %

(730) Antigen Jkb

E1 and S1 (6) APR		>>>	1 Positive	2,4 %
(14) Bio-Rad		>>>	11 Positive	27 %
(50) Merck		>>>	1 Positive	2,4 %
(52) Dynex		>>>	2 Positive	4,9 %
(64) Exbio Olomouc		>>>	1 Positive	2,4 %
(80) DiaMed		>>>	1 Positive	2,4 %
(159) Grifols		>>>	6 Positive	15 %
(172) Immucor		>>>	9 Positive	22 %
(173) Sanguin		>>>	6 Positive	15 %

Summary statistics - qualitative results

(Groups: manufacturer of kit)

EQA round: IH4/22 - Blood Group Serology

Deadline: 18.11.2022

Test

Sample	Group	N	Result	N _{rel}
E1 and S1 (203) ANTITOXIN		>>>	3 Positive	7,3 %
Total per sample: n = 41	—	Success:	100 %	
E2 and S2 (6) APR		>>>	1 Positive	2,4 %
(14) Bio-Rad		>>>	11 Positive	27 %
(50) Merck		>>>	1 Positive	2,4 %
(52) Dynex		>>>	2 Positive	4,9 %
(64) Exbio Olomouc		>>>	1 Positive	2,4 %
(80) DiaMed		>>>	1 Positive	2,4 %
(159) Grifols		>>>	6 Positive	15 %
(172) Immucor		>>>	9 Positive	22 %
(173) Sanguin		>>>	6 Positive	15 %
(203) ANTITOXIN		>>>	3 Positive	7,3 %
Total per sample: n = 41	—	Success:	100 %	

Total success: 100 %

(731) Antigen Lua

E1 and S1 (14) Bio-Rad		>>>	11 Negative	44 %
(64) Exbio Olomouc		>>>	2 Negative	8,0 %
(80) DiaMed		>>>	2 Negative	8,0 %
(159) Grifols		>>>	4 Negative	16 %
(172) Immucor		>>>	4 Negative	16 %
(173) Sanguin		>>>	1 Negative	4,0 %
(203) ANTITOXIN		>>>	1 Negative	4,0 %
Total per sample: n = 25	—	Success:	100 %	
E2 and S2 (14) Bio-Rad		>>>	11 Negative	44 %
(64) Exbio Olomouc		>>>	2 Negative	8,0 %
(80) DiaMed		>>>	2 Negative	8,0 %
(159) Grifols		>>>	4 Negative	16 %
(172) Immucor		>>>	4 Negative	16 %
(173) Sanguin		>>>	1 Negative	4,0 %
(203) ANTITOXIN		>>>	1 Negative	4,0 %
Total per sample: n = 25	—	Success:	100 %	

Total success: 100 %

(732) Antigen Lub

E1 and S1 (14) Bio-Rad		>>>	9 Positive	36 %
(64) Exbio Olomouc		>>>	3 Positive	12 %
(80) DiaMed		>>>	2 Positive	8,0 %
(159) Grifols		>>>	3 Positive	12 %
(172) Immucor		>>>	4 Positive	16 %
(173) Sanguin		>>>	1 Positive	4,0 %
(203) ANTITOXIN		>>>	2 Positive	8,0 %
(999) another manufacturer		>>>	1 Positive	4,0 %
Total per sample: n = 25	—	Success:	100 %	
E2 and S2 (14) Bio-Rad		>>>	9 Positive	36 %
(64) Exbio Olomouc		>>>	3 Positive	12 %
(80) DiaMed		>>>	2 Positive	8,0 %
(159) Grifols		>>>	3 Positive	12 %
(172) Immucor		>>>	4 Positive	16 %
(173) Sanguin		>>>	1 Positive	4,0 %
(203) ANTITOXIN		>>>	2 Positive	8,0 %
(999) another manufacturer		>>>	1 Positive	4,0 %
Total per sample: n = 25	—	Success:	100 %	

Total success: 100 %

(733) Antigen Lea

E1 and S1 (0) not specified		>>>	1 Negative	2,9 %
(14) Bio-Rad		>>>	10 Negative	29 %
(50) Merck		>>>	1 Negative	2,9 %
(52) Dynex		>>>	2 Negative	5,9 %
(64) Exbio Olomouc		>>>	1 Negative	2,9 %
(80) DiaMed		>>>	1 Negative	2,9 %
(159) Grifols		>>>	2 Negative	5,9 %
			1 Positive	2,9 %
(172) Immucor		>>>	9 Negative	26 %
(173) Sanguin		>>>	2 Negative	5,9 %
(174) IVT Imuno		>>>	2 Negative	5,9 %
(203) ANTITOXIN		>>>	2 Negative	5,9 %
Total per sample: n = 34	—	Success:	97 %	
E2 and S2 (0) not specified		>>>	1 Negative	2,9 %

Summary statistics - qualitative results

(Groups: manufacturer of kit)

EQA round: IH4/22 - Blood Group Serology

Deadline: 18.11.2022

Test

Sample	Group	N	Result	N _{rel}
E2 and S2 (14)	Bio-Rad	>>>	10 Negative	29 %
(50)	Merck	>>>	1 Negative	2,9 %
(52)	Dynex	>>>	2 Negative	5,9 %
(64)	Exbio Olomouc	>>>	1 Negative	2,9 %
(80)	Diamed	>>>	1 Negative	2,9 %
(159)	Grifols	>>>	3 Negative	8,8 %
(172)	Immucor	>>>	9 Negative	26 %
(173)	Sanguin	>>>	2 Negative	5,9 %
(174)	IVT Imuno	>>>	2 Negative	5,9 %
(203)	ANTITOXIN	>>>	2 Negative	5,9 %
<hr/> Total per sample: n = 34		Success: 100 %		<hr/>

Total success: 97 %

(734) Antigen Leb

E1 and S1 (0)	not specified	>>>	1 Negative	2,9 %
(14)	Bio-Rad	>>>	10 Negative	29 %
(50)	Merck	>>>	1 Negative	2,9 %
(52)	Dynex	>>>	2 Negative	5,9 %
(64)	Exbio Olomouc	>>>	1 Negative	2,9 %
(80)	Diamed	>>>	1 Negative	2,9 %
(159)	Grifols	>>>	3 Negative	8,8 %
(172)	Immucor	>>>	9 Negative	26 %
(173)	Sanguin	>>>	2 Negative	5,9 %
(174)	IVT Imuno	>>>	2 Negative	5,9 %
(203)	ANTITOXIN	>>>	2 Negative	5,9 %
<hr/> Total per sample: n = 34		Success: 100 %		<hr/>
E2 and S2 (0)	not specified	>>>	1 Positive	2,9 %
(14)	Bio-Rad	>>>	10 Positive	29 %
(50)	Merck	>>>	1 Positive	2,9 %
(52)	Dynex	>>>	2 Positive	5,9 %
(64)	Exbio Olomouc	>>>	1 Positive	2,9 %
(80)	Diamed	>>>	1 Positive	2,9 %
(159)	Grifols	>>>	3 Positive	8,8 %
(172)	Immucor	>>>	9 Positive	26 %
(173)	Sanguin	>>>	2 Positive	5,9 %
(174)	IVT Imuno	>>>	2 Positive	5,9 %
(203)	ANTITOXIN	>>>	2 Positive	5,9 %
<hr/> Total per sample: n = 34		Success: 100 %		<hr/>

Total success: 100 %

(737) Direct Coombs (antiglobulin) test

E1 and S1 (6)	APR	>>>	1 Negative	0,74 %
(14)	Bio-Rad	>>>	61 Negative	45 %
(40)	Ortho Clinical Diagnostics	>>>	2 Negative	1,5 %
(64)	Exbio Olomouc	>>>	2 Negative	1,5 %
(80)	Diamed	>>>	25 Negative	19 %
(159)	Grifols	>>>	42 Negative	31 %
(174)	IVT Imuno	>>>	1 Negative	0,74 %
(203)	ANTITOXIN	>>>	1 Negative	0,74 %
<hr/> Total per sample: n = 135		Success: 100 %		<hr/>
E2 and S2 (6)	APR	>>>	1 Negative	0,74 %
(14)	Bio-Rad	>>>	61 Negative	45 %
(40)	Ortho Clinical Diagnostics	>>>	2 Negative	1,5 %
(64)	Exbio Olomouc	>>>	2 Negative	1,5 %
(80)	Diamed	>>>	25 Negative	19 %
(159)	Grifols	>>>	42 Negative	31 %
(174)	IVT Imuno	>>>	1 Negative	0,74 %
(203)	ANTITOXIN	>>>	1 Negative	0,74 %
<hr/> Total per sample: n = 135		Success: 100 %		<hr/>

Total success: 100 %

(741) Antibody screening (IAT, blood donor)

E1 and S1 (0)	not specified	>>>	1 Positive	1,1 %
(6)	APR	>>>	4 Positive	4,6 %
(14)	Bio-Rad	>>>	33 Positive	38 %
(40)	Ortho Clinical Diagnostics	>>>	1 Positive	1,1 %
(64)	Exbio Olomouc	>>>	1 Positive	1,1 %
(80)	Diamed	>>>	12 Positive	14 %
(159)	Grifols	>>>	21 Positive	24 %
(172)	Immucor	>>>	14 Positive	16 %

Summary statistics - qualitative results

(Groups: manufacturer of kit)

EQA round: IH4/22 - Blood Group Serology

Deadline: 18.11.2022

Test

Sample	Group	N	Result	N _{rel}
	Total per sample: n = 87	Success: 100 %	-	
E2 and S2 (0) not specified		>>> 1	Positive	1,1 %
(6) APR		>>> 4	Positive	4,6 %
(14) Bio-Rad			1 Not specified	1,1 %
		>>> 32	Positive	37 %
(40) Ortho Clinical Diagnostics		>>> 1	Positive	1,1 %
(64) Exbio Olomouc		>>> 1	Positive	1,1 %
(80) DiaMed		>>> 12	Positive	14 %
(159) Grifols		>>> 21	Positive	24 %
(172) Immucor		>>> 14	Positive	16 %
	Total per sample: n = 87	Success: 99 %	-	

Total success: 99 %

(743) Antibody screening (IAT, recipient)

E1 and S1 (0) not specified		>>> 1	Positive	0,69 %
(6) APR		>>> 2	Positive	1,4 %
(14) Bio-Rad		>>> 64	Positive	44 %
(40) Ortho Clinical Diagnostics		>>> 2	Positive	1,4 %
(80) DiaMed		>>> 25	Positive	17 %
(159) Grifols		>>> 44	Positive	31 %
(172) Immucor		>>> 6	Positive	4,2 %
	Total per sample: n = 144	Success: 100 %	-	
E2 and S2 (0) not specified		>>> 1	Positive	0,69 %
(6) APR		>>> 2	Positive	1,4 %
(14) Bio-Rad		>>> 64	Positive	44 %
(40) Ortho Clinical Diagnostics		>>> 2	Positive	1,4 %
(80) DiaMed		>>> 25	Positive	17 %
(159) Grifols		>>> 44	Positive	31 %
(172) Immucor		>>> 6	Positive	4,2 %
	Total per sample: n = 144	Success: 100 %	-	

Total success: 100 %

(745) Antibody screening (IAT, pregnant)

E1 and S1 (6) APR		>>> 2	Positive	1,7 %
(14) Bio-Rad		>>> 50	Positive	43 %
(40) Ortho Clinical Diagnostics		>>> 2	Positive	1,7 %
(64) Exbio Olomouc		>>> 1	Positive	0,87 %
(80) DiaMed		>>> 18	Positive	16 %
(159) Grifols		>>> 36	Positive	31 %
(172) Immucor		>>> 6	Positive	5,2 %
	Total per sample: n = 115	Success: 100 %	-	
E2 and S2 (6) APR		>>> 2	Positive	1,7 %
(14) Bio-Rad		>>> 50	Positive	43 %
(40) Ortho Clinical Diagnostics		>>> 2	Positive	1,7 %
(64) Exbio Olomouc		>>> 1	Positive	0,87 %
(80) DiaMed		>>> 18	Positive	16 %
(159) Grifols		>>> 36	Positive	31 %
(172) Immucor		>>> 6	Positive	5,2 %
	Total per sample: n = 115	Success: 100 %	-	

Total success: 100 %

(747) Antibody screening (enzyme test)

E1 and S1 (0) not specified		>>> 1	Positive	0,92 %
(14) Bio-Rad		>>> 50	Positive	46 %
(40) Ortho Clinical Diagnostics		>>> 2	Positive	1,8 %
(80) DiaMed			1 Negative	0,92 %
		>>> 18	Positive	17 %
(159) Grifols			1 Not specified	0,92 %
		>>> 35	Positive	32 %
(172) Immucor		>>> 1	Positive	0,92 %
	Total per sample: n = 109	Success: 98 %	-	
E2 and S2 (0) not specified		>>> 1	Positive	0,92 %
(14) Bio-Rad		>>> 50	Positive	46 %
(40) Ortho Clinical Diagnostics		>>> 2	Positive	1,8 %
(80) DiaMed		>>> 19	Positive	17 %
(159) Grifols		>>> 36	Positive	33 %
(172) Immucor		>>> 1	Positive	0,92 %
	Total per sample: n = 109	Success: 100 %	-	

Total success: 98 %

(750) Antibody identification

E1 and S1 (0) not specified	> 44	anti-E; anti-Fya	88 %
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Summary statistics - qualitative results

(Groups: manufacturer of kit)

EQA round: IH4/22 - Blood Group Serology

Deadline: 18.11.2022

Test

Sample	Group	N	Result	N _{rel}
E1 and S1 (0) not specified		1	anti-E; anti-Fya; anti-Cw	2,0 %
		>>>	5 anti-E; anti-Fya; anti-Wra	10 %
Total per sample: n = 50	—	Success:	98 %	
E2 and S2 (0) not specified		>>>	49 anti-D	98 %
			1 anti-D; anti-Cw	2,0 %
Total per sample: n = 50	—	Success:	98 %	
Total success: 98 %				

(752) Antibody titre, Sample 1: 1st antibody

E1 and S1 (0) not specified	± 3	titre 4	9,7 %
	± 8	titre 8	26 %
	± 4	titre 16	13 %
	± 12	titre 32	39 %
	± 3	titre 64	9,7 %
	± 1	titre 128	3,2 %
Total per sample: n = 31	—	Success (only evaluated results): not assessed	-

(753) Antibody titre, Sample 1: 2nd antibody

E1 and S1 (0) not specified	± 10	titre 8	29 %
	± 16	titre 16	47 %
	± 6	titre 32	18 %
	± 2	titre 64	5,9 %
Total per sample: n = 34	—	Success (only evaluated results): not assessed	-

(754) Antibody titre, Sample 1: 3rd antibody

E1 and S1 (0) not specified	± 3	titre 16	75 %
	± 1	titre 32	25 %
Total per sample: n = 4	—	Success (only evaluated results): not assessed	-

(756) Antibody titre, Sample 2: 1st antibody

E2 and S2 (0) not specified	± 2	titre 256	5,9 %
	± 3	titre 32	8,8 %
	± 16	titre 64	47 %
	± 13	titre 128	38 %
Total per sample: n = 34	—	Success (only evaluated results): not assessed	-

Set 3**(760) Crossmatch**

S1 All results	>>>	130 Crossmatch successful	100 %
Total per sample: n = 130	—	Success:	100 %
S2 All results	>>>	130 Crossmatch successful	100 %
Total per sample: n = 130	—	Success:	100 %

Total success: 100 %

(761) Crossmatch (segment K1)

S1 (0) not specified	>>>	130 Positive test	100 %
Total per sample: n = 130	—	Success:	100 %
S2 (0) not specified	>>>	130 Negative test	100 %
Total per sample: n = 130	—	Success:	100 %

Total success: 100 %

(762) Serve transfusion product (segment K1)

S1 (0) not specified	± 129	Impossible, risk of haemolysis	99 %
	± 1	Decision depends on results of other tests not performed in our laboratory	0,77 %
Total per sample: n = 130	—	Success (only evaluated results): not assessed	-
S2 (0) not specified	± 4	Impossible, risk of haemolysis	3,1 %
	± 73	Decision depends on results of other tests not performed in our laboratory	56 %
	± 32	Only if more suitable products are not available	25 %
	± 21	Possible	16 %
Total per sample: n = 130	—	Success (only evaluated results): not assessed	-

(764) Crossmatch (segment K2)

S1 (0) not specified	>>>	130 Negative test	100 %
Total per sample: n = 130	—	Success:	100 %
S2 (0) not specified	>>>	130 Positive test	100 %
Total per sample: n = 130	—	Success:	100 %

Total success: 100 %

(765) Serve transfusion product (segment K2)

S1 (0) not specified	± 2	Impossible, risk of haemolysis	1,5 %
	± 75	Decision depends on results of other tests not performed in our laboratory	58 %

Summary statistics - qualitative results

(Groups: manufacturer of kit)

EQA round: IH4/22 - Blood Group Serology

Deadline: 18.11.2022

Test

Sample	Group	N	Result	N _{rel}
S1	(0) not specified	± 33	Only if more suitable products are not available	25 %
		± 20	Possible	15 %
	Total per sample: n = 130	—	Success (only evaluated results): not assessed	-
S2	(0) not specified	± 128	Impossible, risk of haemolysis	98 %
		± 2	Decision depends on results of other tests not performed in our laboratory	1,5 %
	Total per sample: n = 130	—	Success (only evaluated results): not assessed	-

st_kl

End of report

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