

PCR-/NAT *Mycoplasma pneumoniae*
(RV 541) April 2011, Group 1



Tabelle 1: Probenzusammensetzung und erwartetes Ergebnis.
Sample composition and expected results.

Group 1	Erwartet / expected		Probenzusammensetzung / Sample composition
1115411	++	61	<i>Mycoplasma pneumoniae</i> (~ 10 ⁵ genome copies/mL)
1115412	∅	62	<i>Escherichia coli</i> K12
1115413	(+)	61	<i>Mycoplasma pneumoniae</i> (~ 10 ³ genome copies/mL)
1115414	+	61	<i>Mycoplasma pneumoniae</i> (~ 10 ⁴ genome copies/mL)

Tabelle 2: Häufigkeit der Mitteilung verschiedener Befunde.
Absolute numbers of reported individual results.

n = 105	Probennummer (Sample no.)				Inhibition
	1115411	1115412	1115413	1115414	
Befund Result					
Positiv	104	0	68	95	n.d.
Negativ	1	103	36 ¹⁾	8	nein no
Fraglich Questionable	0	2	1	2	ja yes

Tabelle 3: Häufigkeit richtig positiver und richtig negativer NAT-Befunde bei Anwendern verschiedener Methoden.

Absolute numbers and relative frequency of reported true positive and true negative results among various NAT methods.

NAT-Methode [Code] (total number *)	NAT richtig positiv True positive results			NAT richtig negativ True negative results		
	Absolut Absolute	Relativ Relative	%	Absolut Absolute	Relativ Relative	%
LightMix <i>M.pneumoniae</i> [20] (n = 10)	18	18 / 29 [§]	62	10	10 / 10	100
Qiagen <i>M.pneumoniae</i> [21] (n = 5)	15	15 / 15	100	4	4 / 4 [§]	100
Minerva Venor Mp [22] (n = 1)	3	3 / 3	100	0	0 / 0 [§]	-
Commercial assay / kit [27] (n = 33)	79	79 / 99	80	33	33 / 33	100
In house PCR assay [28] (n = 54)	151	151/160 [§]	94	54	54 / 54	100
Andere / k.A. / other [29] (n = 2)	2	2 / 6	33	2	2 / 2	100

[§] Due to reporting questionable results, the number of true results (denominator in the "relative" column) have been reduced

Comments: ¹⁾ As sample # 1115413 contained a very low number of *Mycoplasma pneumoniae* target organisms, negative PCR results were not rated as "false negative", but the participants may consider to improve the analytical sensitivity of their corresponding PCR assays.

PCR-/NAT *Mycoplasma pneumoniae*
(RV 541) April 2011, Group 2



Tabelle 1: Probenzusammensetzung und erwartetes Ergebnis.
Sample composition and expected results.

Group 2	<i>Erwartet / expected</i>		<i>Probenzusammensetzung / Sample composition</i>
1115415	+	61	<i>Mycoplasma pneumoniae</i> (~ 10 ⁴ genome copies/mL)
1115416	++	61	<i>Mycoplasma pneumoniae</i> (~ 10 ⁶ genome copies/mL)
1115417	∅	62	<i>Escherichia coli</i> K12
1115418	+	61	<i>Mycoplasma pneumoniae</i> (~ 10 ⁵ genome copies/mL)

Tabelle 2: Häufigkeit der Mitteilung verschiedener Befunde.
Absolute numbers of reported individual results.

<i>n = 7</i>	<i>Probennummer (Sample no.)</i>					<i>Inhibition</i>			
	1115415	1115416	1115417	1115418		1115415	1115416	1115417	1115418
Befund <i>Result</i>									
Positiv	7	7	0	7	n.d.	0	0	0	0
Negativ	0	0	7	0	nein <i>no</i>	7	7	7	7
Fraglich <i>Questionable</i>	0	0	0	0	ja <i>yes</i>	0	0	0	0

Tabelle 3: Häufigkeit richtig positiver und richtig negativer NAT-Befunde bei Anwendern verschiedener Methoden.
Absolute numbers and relative frequency of reported true positive and true negative results among various NAT methods.

NAT-Methode [Code] (total number *)	NAT richtig positiv <i>True positive results</i>			NAT richtig negativ <i>True negative results</i>		
	Absolut <i>Absolute</i>	Relativ <i>Relative</i>	%	Absolut <i>Absolute</i>	Relativ <i>Relative</i>	%
LightMix <i>M.pneumoniae</i> [20] (n = 1)	3	3 / 3	100	1	1 / 1	100
Commercial assay / kit [27] (n = 1)	3	3 / 3	100	1	1 / 1	100
In house PCR assay [28] (n =5)	15	15 / 15	100	5	5 / 5	100