



**PROFICIENCY TESTING REPORT**  
**ISHTM-AIIMS EXTERNAL QUALITY ASSURANCE PROGRAMME**  
 NABL accredited program as per ISO/IEC 17043:2010 standard  
 Organized By Department of Hematology, AIIMS, New Delhi-110029



*Duration of stability testing - minimum upto 8 days at ambient temp. after dispatch of specimens*

EQAP CODE No. : 5478

Distribution No.: 158-N

Month/Year: February/2023

Instrument ID: OPL/LAB/HM/EQP 01 (K11042133063)

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### CBC and Retic Assessment

Test Parameters	S.No.	Among Lab (Accuracy Testing)						Within Lab (Precision Testing)			
		Your Result 1	Your Result 2	Your Results Sum of 2 Value	Consensus result sum of 2 values (Assigned Value)	Uncertainty of Assigned Values	Z Score	Yours Results Diff. of 2 Values	Consensus Result Diff. of 2 values (Assigned Value)	Uncertainty of Assigned Values	Z Score
WBC x10 <sup>3</sup> /µl	1	7.63	7.59	15.22	14.94	0.0360	<b>0.31</b>	0.04	0.1	0.0080	<b>-0.58</b>
RBC x10 <sup>6</sup> /µl	1	3.78	3.78	7.56	7.31	0.0090	<b>1.05</b>	0	0.04	0.0020	<b>-1.08</b>
Hb g/dl	1	12.2	12.1	24.3	24.9	0.0270	<b>-0.98</b>	0.1	0.1	0.0080	<b>0.00</b>
HCT%	1	42.3	42.1	84.4	78.15	0.1710	<b>1.19</b>	0.2	0.4	0.0250	<b>-0.45</b>
MCV-fl	1	111.8	111.2	223	214.85	0.4180	<b>0.61</b>	0.6	0.3	0.0230	<b>0.81</b>
MCH-Pg	1	32.3	32.1	64.4	68.1	0.0800	<b>-1.77</b>	0.2	0.3	0.0220	<b>-0.27</b>
MCHC-g/dl	1	29	28.7	57.7	63.4	0.1470	<b>-1.28</b>	0.3	0.3	0.0200	<b>0.00</b>
Plt. x10 <sup>3</sup> /µl	1	186	186	372	319	1.68	<b>1.03</b>	0	5	0.32	<b>-0.96</b>
Retic %	2	7.5	7	14.5	10	0.18	<b>0.89</b>	0.5	0.5	0.03	<b>0.00</b>

### P.S . Assesment

YOUR REPORT		CONSENSUS REPORT
<b>DLC%</b>	3	Nrbcs=12 , Poly=08 L=48, E=06, Mono/Promono=00 , B1=38 P.M.=00, Mye=00, Meta=00, Other=-
<b>RBC Morphology</b>	3	Lympho: 49-73, Blast: 5-35, Poly:4-10, nRBC/Eos/Baso/Mono /Myelo/Meta/ Promyelo: 0-5
<b>Diagnosis</b>	3	ACUTE SUBLEUKEMIC LEUKEMIA, Acute Leukemia (AL)

**COMBINED DATA VALUES OF TOTAL PARTICIPANTS**

Test parameters	S.No.	Total participants covered in the current dist. 158--N	Total No. responded	% of Labs with Z Score 0-2		% of Labs with Z Score 2-3		% of Labs with Z Score >3	
				Among labs	Within lab	Among labs	Within lab	Among labs	Within lab
<b>WBC x10<sup>3</sup>/µl</b>	1	342	340	80	85.59	4.71	3.53	15.29	10.88
<b>RBC x10<sup>6</sup>/µl</b>	1	342	342	88.3	90.35	6.73	3.51	4.97	6.14
<b>Hb g/dl</b>	1	342	342	86.55	85.96	6.73	6.73	6.72	7.31
<b>HCT%</b>	1	342	340	95.88	87.94	3.53	5.29	0.59	6.77
<b>MCV-fl</b>	1	342	340	97.35	92.35	1.76	2.35	0.89	5.3
<b>MCH-Pg</b>	1	342	340	86.47	88.24	8.82	6.47	4.71	5.29
<b>MCHC-g/dl</b>	1	342	340	95.59	90.88	3.24	4.71	1.17	4.41
<b>Plt. x10<sup>3</sup>/µl</b>	1	342	340	95	90	3.24	3.82	1.76	6.18
<b>ReticCount%</b>	2	342	265	94.34	89.81	4.53	5.66	1.13	4.53
<b>PS Assessment</b>	3	342	244	Satisfactory :81.59%, Borderline Sat. :11.40%, Unsatisfactory :7.01%					

**\*Comments:**

**1). Among Lab (EQA) : Results acceptable.**

**2). Within Lab (IQA) : Precision acceptable.**

**Note-1: EQA** (External Quality Assurance) : Your Performance among various of participating labs in PT, to determine the accuracy of your results.

**IQA** ( Internal Quality Assurance) : Your Performance of comparison of two consecutive measurement values within your lab to test the precision of your autoanalyzer.

**Note-2:** Z score among & within lab were calculated, as per to ISO/IEC 13528:2015 standard. Z score among lab (EQA)= (Your Result Sum of two values - Consensus Result sum of two values)/(Normalised IQR)

Z score within lab (IQA)= (Your Result Difference of two values - Consensus Result difference of two values)/(Normalised IQR)

IQR = Quartile 3 - Quartile 1 of participant data, Normalised IQR = 0.7413 x IQR

**Note-3:** Z score 0 to  $\pm 2$ : Acceptable, Z score  $\pm 2$  to  $\pm 3$  :Warning Signal, Z score  $> \pm 3$  : Unacceptable [As per ISO/IEC 13528:2015 standard]

**Note-4:** Z score value between "0 to  $\pm 2$ " are texted in green colour. Z score value between " $\pm 2$  to  $\pm 3$ " are texted in orange colour. Z score value  $> \pm 3$  are texted in red colour.

**Note-5:** Homogeneity and stability testing of PT sample were done as per ISO 13528:2015 standard. To pass homogeneity test, between sample SD (Ss) should be smaller than the check value (0.3\*SDPA). To pass the stability test, average difference in measurement values of first and last day sample ( $\bar{x}-\bar{y}$ ) should be smaller than the check value (0.3\*SDPA).

**Note-6:** ISHTM-AIIMS-EQAP does not subcontract any task of its scheme

**Note-7:** Participants are free to use methods/analyzer of their own choice.

**Note-8:** Proficiency testing (PT ) samples are sent quarterly to each participant.

**Note-9:** All the necessary details regarding design and implementation of PT, are provided in the instruction sheet as well as on programme's website [www.ishtmaiimseqap.com](http://www.ishtmaiimseqap.com).

**Note 10:** Reports are kept confidential.

Report authorized by,



Dr. Seema Tyagi (Prof.)

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