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

PC-1002

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

EQAP CODE No. : 4267 **Distribution No.:** 157-K **Month/Year:** September/2022

Instrument ID: BC 6200

Name & Contact No. of PT Co-ordinator: Dr. Seema Tyagi (Prof.), Hematology, AIIMS, Delhi,
Tel: 9013085730 , E-Mail : accuracy2000@gmail.com

Date of issue & status of the report: 16-11-2022[Final].

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 x10^3/µl	1	5.62	5.4	11.02	12.89	0.1380	**-0.64**	0.22	0.16	0.0150	**0.37**
RBC x10^6/µl	1	3.6	3.54	7.14	8.86	0.0160	**-6.27**	0.06	0.06	0.0050	**0.00**
Hb g/dl	1	10.3	10.2	20.5	26.4	0.0420	**-6.77**	0.1	0.1	0.0130	**0.00**
HCT%	1	38	37.4	75.4	84.3	0.3220	**-1.32**	0.6	0.6	0.0520	**0.00**
MCV-fl	1	105.8	105.6	211.4	189.3	0.5760	**1.76**	0.2	0.3	0.0310	**-0.22**
MCH-Pg	1	28.9	28.7	57.6	59.5	0.1010	**-0.88**	0.2	0.3	0.0290	**-0.34**
MCHC-g/dl	1	27.4	27.1	54.5	62.7	0.2190	**-1.81**	0.3	0.4	0.0370	**-0.19**
Plt. x10^3/µl	1	158	154	312	487	3.76	**-2.29**	4	8	0.63	**-0.54**
Retic %	2	2.5	2	4.5	2.9	0.10	**0.63**	0.5	0.2	0.01	**1.35**

P.S . Assesment

		YOUR REPORT	CONSENSUS REPORT
DLC%	3	Nrbcs=0 , Poly=07 L=10, E=02, Mono/Promono=03 , B1=72 P.M.=04, Mye=01, Meta=01, Other=nil	Blast: 70-90, Lympho: 4-15, Poly: 2-6, nRBC/Eos/Baso/Mono /Myelo/Meta/ Promyelo: 0-5
RBC Morphology	3	Normocytic Normochromic	Predominantly: Normocytic/ Normochromic, Moderate: Anisocytosis, Microcytic
Diagnosis	3	Acute Leukaemia (probably AML)	Acute Leukemia (AL)

COMBINED DATA VALUES OF TOTAL PARTICIPANTS

Test parameters	S.No.	Total participants covered in the current dist. 157--K	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
WBC $x10^3$/µl	1	188	183	86.34	90.71	3.28	2.73	10.38	6.56
RBC $x10^6$/µl	1	188	188	79.26	82.98	8.51	5.85	12.23	11.17
Hb g/dl	1	188	188	86.17	86.17	3.72	2.66	10.11	11.17
HCT%	1	188	182	92.86	84.07	3.85	5.49	3.29	10.44
MCV-fl	1	188	182	92.31	91.76	4.4	2.75	3.29	5.49
MCH-Pg	1	188	182	91.21	83.52	3.85	6.04	4.94	10.44
MCHC-g/dl	1	188	182	91.76	87.36	4.95	6.04	3.29	6.6
Plt. $x10^3$/µl	1	188	182	90.11	89.56	6.59	3.3	3.3	7.14
ReticCount%	2	188	164	86.59	94.51	7.32	1.22	6.09	4.27
PS Assessment	3	188	170	Satisfactory :94.67%, Borderline Sat. :3.20%, Unsatisfactory :2.13%					

*Comments:

1). Among Lab (EQA) : CBC result for RBC & HB unacceptable, please check calibration/human error.Remaining 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 ±2: Acceptable, Z score ±2 to ±3 :Warning Signal, Z score > ±3 : Unacceptable [As per ISO/IEC 13528:2015 standard]

Note-4: Z score value between"0 to ±2" are texted in green colour. Z score value between"±2 to ±3" are texted in orange colour. Z score value > ±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.

Note 10: Reports are kept confidential.

Report authorized by,

Dr. Seema Tyagi (Prof.)
PT Co-ordinator: ISHTM-AIIMS-EQAP
Department of Hematology, AIIMS, New Delhi

----------End Of Report----------