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. : 5244 **Distribution No.:** 158-M **Month/Year:** January/2023

Instrument ID: HORIBA yumizen H500

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: 28-02-2023[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	6.06	6.06	12.12	13.31	0.0350	**-1.36**	0	0.1	0.0070	**-1.04**
RBC x10^6/µl	1	5.18	5.18	10.36	10.25	0.0120	**0.32**	0	0.05	0.0030	**-0.96**
Hb g/dl	1	13.7	13.7	27.4	26.5	0.0270	**1.21**	0	0.1	0.0080	**-0.67**
HCT%	1	38.6	38.6	77.2	85.7	0.2190	**-1.14**	0	0.4	0.0250	**-1.03**
MCV-fl	1	75.2	75.2	150.4	169.35	0.3530	**-1.65**	0	0.3	0.0190	**-0.95**
MCH-Pg	1	26.7	26.7	53.4	51.5	0.0590	**1.17**	0	0.2	0.0140	**-0.90**
MCHC-g/dl	1	35.5	35.5	71	61	0.1400	**1.84**	0	0.3	0.0210	**-1.01**
Plt. x10^3/µl	1	381	381	762	781	2.99	**-0.21**	0	9	0.52	**-1.10**
Retic %	2	12	10	22	15.35	0.22	**1.11**	2	0.5	0.03	**2.53**

P.S . Assesment

		YOUR REPORT	CONSENSUS REPORT
DLC%	3	Nrbcs=2 , Poly=2 L=11, E=0, Mono/Promono=2 , B1=76 P.M.=5, Mye=3, Meta=1, Other=smudge cells present	Blast: 65-88, Lympho: 5-14, Poly: 2-5, nRBC/Eos/Baso/Mono /Myelo/Meta/ Promyelo: 0-5
RBC Morphology	3	Normocytic normochromic	Predominantly: Normocytic/ Normochromic, Moderate: Anisocytosis, Microcytic
Diagnosis	3	Acute leukemia ? AML	Acute Leukemia (AL)

COMBINED DATA VALUES OF TOTAL PARTICIPANTS

Test parameters	S.No.	Total participants covered in the current dist. 158--M	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	338	335	83.88	84.18	6.27	6.27	9.85	9.55
RBC $x10^6$/µl	1	338	338	89.64	89.35	5.92	5.03	4.44	5.62
Hb g/dl	1	338	338	88.76	85.21	5.03	4.44	6.21	10.35
HCT%	1	338	336	97.92	89.88	0.89	5.36	1.19	4.76
MCV-fl	1	338	336	97.62	87.2	1.79	6.55	0.59	6.25
MCH-Pg	1	338	336	88.39	89.58	7.44	4.76	4.17	5.66
MCHC-g/dl	1	338	336	98.21	86.9	0.89	7.74	0.9	5.36
Plt. $x10^3$/µl	1	338	336	94.64	92.26	3.27	2.98	2.09	4.76
ReticCount%	2	338	296	91.22	85.14	6.08	9.8	2.7	5.06
PS Assessment	3	338	283	Satisfactory :97.93%, Borderline Sat. :1.18%, Unsatisfactory :0.890%					

*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 ±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----------