

Format of Budget for ICMR Extramural Call (Staff, Equipment, Contingency/Consumables and Travel Allowance)

Staff/Manpower:
TOTAL MANPOWER SALARY: 30,63,240

Sl. No.	Salary (As per ICMR Project guidelines)
1. Project Research Scientist II (Non-Medical)	67000 per month + HRA (27%) =INR 85090 pm Yearly salary: 85090*12 = 10,21,080 Salary for three years: 30,63,240 INR

Justification of Staff/Manpower: This project deals with identifying the [REDACTED] marks in [REDACTED] and how these [REDACTED] marks play a role in [REDACTED] function. This project involves patient sample collection, RNA isolation, and further mRNA isolation. This will be followed by MazF digestion and purification and then MAZTER Seq (Discovery cohort). The analysis for the MAZTER Seq will be performed using the MAZTER-MINE pipeline. After analysis, the targets will be selected and validated in the larger cohort by performing [REDACTED] PCR. The selected targets will be further studied to check their effect on the phenotypic changes in [REDACTED] cell lines. The sgRNA for the selected targets will be designed and cloned in the lentiviral plasmids. The programmable modifications will be performed, followed by a study of the phenotypic changes by cell proliferation assay and cell cycle analysis.

The experienced Project Scientist 2 (PRS 2) will be responsible for the overall execution of the project, sample collection, and its processing, and the development of the [REDACTED] Seq assay, followed by validation in larger cohorts, cloning, and performing programmable modification experiments. He/she will also be responsible for developing downstream phenotypic assays, data analysis, and manuscript writing.

Equipment required: Major equipment related to experiments proposed in the project is already available in the lab/department of PI or Co-PI. No equipment is required

Contingency: TOTAL 3,00,000 INR

Detail	Breakup with Justification
Year 1: Total Amount 1,00,000 INR	Contingency expenses are set aside for unforeseen, sudden expenses. These include repairs of equipment, small computer accessories and purchase of software for fellows employed in the project and purchase of necessary research consumables after the routine budget has been exhausted. Publication related charges are also utilized from the contingency budget.
Year 2: Total Amount 1,00,000 INR	
Year 3: Total Amount 1,00,000 INR	

Consumables: TOTAL 57,00,000 INR

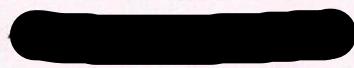
Detail	Breakup with Justification
Year 1: 17,00,000 INR	Given below
Year 2: 20,00,000 INR	
Year 3: 20,00,000 INR	

**Format of Budget for ICMR Extramural Call
(Staff, Equipment, Contingency/Consumables and Travel Allowance)**

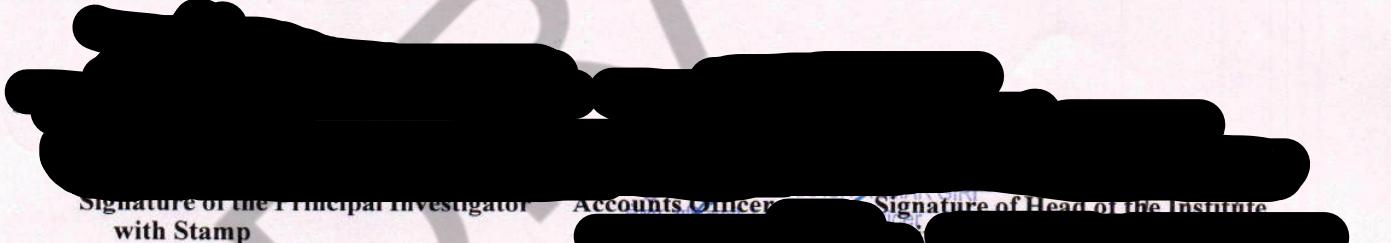
Breakup of Consumables budget (Detailed justification attached separately)

Head/Year	Year I	Year II	Year III	Total
Clinical samples collection, MRD detection antibodies and flowcytometry consumables	150000	150000	150000	450000
Cell lines	250000	0	0	250000
Paired m6A-Seq Analysis and MazF qPCR consumables	850000	700000	700000	2250000
Cell culture consumables: Flasks, steripipettes, plasticware	150000	400000	400000	950000
Consumables for molecular biology work: RNA isolation, Real Time PCR, primers, antibodies, cell proliferation assay kits	200000	300000	300000	800000
Cloning and associated consumables: Plasmid preparation kits, buffers, PCR purification, gel extraction kits, Sanger sequencing	100000	300000	300000	700000
Cell proliferation: MTS kits, Annexin kits, chemosensitivity assays	0	150000	150000	300000
Yearly Total	1700000	2000000	2000000	5700000

**Format of Budget for ICMR Extramural Call
(Staff, Equipment, Contingency/Consumables and Travel Allowance)**



Manpower	Year 1	Year 2	Year 3	TOTAL
Project Scientist-II (Non-Medical)	1021080	1021080	1021080	3063240
Contingency	100000	100000	100000	300000
Consumables	1700000	2000000	2000000	5700000
TOTAL WITHOUT O/H	2821080	3121080	3121080	9063240
Overheads	84632	93632	93632	271896
GRAND TOTAL				9335136



Signature of the Principal Investigator
with Stamp

Accounts Officer

Signature of Head of the Institute

Date: _____

Justification of budget asked for

Proposal ID: [REDACTED]

Title of Research Proposal: [REDACTED]

Total Budget requirements (with detailed break-up and full justification):

Budget

Heads/Year	Year 1	Year 2	Year 3	TOTAL
Manpower: Project Research Scientist II (Non-Medical)	1021080	1021080	1021080	3063240
Contingency	100000	100000	100000	300000
Consumables	1700000	2000000	2000000	5700000
TOTAL WITHOUT O/H	2821080	3121080	3121080	9063240
Overheads	84632	93632	93632	271896
Yearly Total for AIIMS	2905712	3214712	3214712	9335136

Total Project Cost = INR 93,35,136

Justification for manpower required:

Project Research Scientist II (Non-Medical): This project deals with identifying the [REDACTED] marks [REDACTED] and how these [REDACTED] marks play a role in [REDACTED] function. This project involves patient sample collection, RNA isolation, and further mRNA isolation. This will be followed by MazF digestion and purification and then MAZTER Seq (Discovery cohort). The analysis for the MAZTER Seq will be performed using the MAZTER-MINE pipeline. After analysis, the targets will be selected and validated in the larger cohort by performing [REDACTED] qPCR. The selected targets will be further studied to check their effect on the phenotypic changes in [REDACTED] cell lines. The sgRNA for the selected targets will be designed and cloned in the lentiviral plasmids. The programmable modifications will be performed, followed by a study of the phenotypic changes by cell proliferation assay and cell cycle analysis.

The experienced Project Scientist 2 (PRS 2) will be responsible for the overall execution of the project, sample collection, and its processing, and the development of the [REDACTED] Seq assay, followed by validation in larger cohorts, cloning, and performing programmable modification experiments. He/she will also be responsible for developing downstream phenotypic assays, data analysis, and manuscript writing.

Justification for Equipment: Major equipment related to experiments proposed in the project is already available in the lab/department of PI or Co-PI. No equipment is required

Justification for Consumables:

Below is a breakdown of the project's consumables budget.

	Year 1	Year 2	Year 3
Clinical samples collection, MRD detection antibodies, and flowcytometry consumables	150000	150000	150000
Cell lines (HEK293T, REH, RS4;11, Nalm6)	250000	0	0
Paired m6A-Seq Analysis and MazF qPCR consumables (MaZF enzyme, RT, SYBR green PCR mix)	850000	700000	700000
Cell culture consumables: Flasks, steripipettes, plasticware	150000	400000	400000
Consumables for molecular biology work: RNA isolation, Real-time PCR, primers, antibodies, cell proliferation assay kits	200000	300000	300000
Cloning and associated consumables: Plasmid preparation kits, buffers, PCR purification, gel extraction kits, Sanger sequencing	100000	300000	300000
Cell proliferation: MTS kits, Annexin kits, chemosensitivity assay	0	150000	150000
Total	1700000	2000000	2000000

Clinical sample collection, MRD detection antibodies and flow cytometry consumables:

These will be the plasticware used for sample collection and processing, a large panel of antibodies for MRD detection using [REDACTED] associated immunophenotypes (LAIP), and quantitation, flow cytometry tubes and associated consumables

Cell lines: This study will use the [REDACTED] cell lines [REDACTED] 11, and NALM6. HEK293T will be used for [REDACTED] packaging. Cell lines unavailable in the lab will be procured from ATCC for this work. They will be regularly tested for mycoplasma and STR screened to study their originality.

Consumables for molecular biology work for Objectives 1 and 2 include RNA isolation, Reverse Transcriptase, Real-Time PCR, primers, and antibodies for flow cytometry. These include TRIzol, associated chemicals, and plasticware for RNA isolation, followed by cDNA preparation and SYBR Green-based Real-Time PCR kits to measure gene expression.

Cell culture reagents and Consumables: The estimated costs for supplies are based on expenses incurred during the past few years for performing similar experiments. Consumables for cell culture work include flasks, Culture plates, Serological Pipettes, Syringe Filters, Conical

tubes, and FBS serum; culture media: RPMI, DMEM, and other cell-specific media; Trypsin, Antibiotics, Growth supplements, PBS, DMSO, cryovials, 35 mm culture dishes, Cell counting chamber, Coverslip, gloves, plasticware, and glassware with all routine chemicals needed in a molecular biology lab.

Cloning and associated consumables: LB media, LB agarose, Restriction enzymes, T4 ligation, Plasmid extraction Kits, Polymerases; Maxi-prep kit, DNA extraction, DNA purification kits; Gel extraction kits, Sanger sequencing to verify clones.

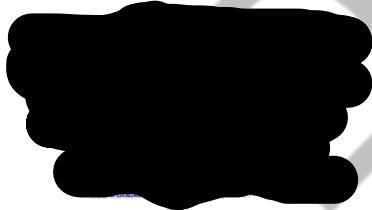
Flow cytometry and Western Blot antibodies and associated consumables: Antibodies required to detect m6A in cells by fluorescent microscopy and western blotting will be done. Apoptosis kits and cell culture kits to study the downstream phenotypic changes in [REDACTED] cell lines after programmable [REDACTED] modifications.

RNA-Seq for Objective 1: Objective 1 is to identify the [REDACTED] RNA-Seq for 10 primary and 10 relapse patients will be performed along with CD19+ B-cells (n=5) enriched from the peripheral blood of healthy controls using Magnetic Sorting (MACS). The mRNA from these samples will be isolated, followed by MazF digestion and purification. This will be followed by High throughput RNA-Sequencing (RNA-Seq) using the Illumina platform.

Consumables for viral vector preparation: These will include the transfection and transduction reagents, including lipofectamine, polybrene, and lentivirus concentration and titration kits.

Justification for Contingencies: Contingency expenses are set aside for unforeseen, sudden expenses. These include repairs of equipment, small computer accessories and purchase of software for fellows employed in the project and purchase of necessary research consumables after the routine budget has been exhausted. Publication-related charges are also utilized from the contingency budget.

Overheads: 3%



Signature of Principal Investigator (with Seal)

