



MEMORANDUM OF UNDERSTANDING

BETWEEN

BEML LIMITED
BENGALURU

AND

INDIAN INSTITUTE OF TECHNOLOGY
KHARAGPUR

MEMORANDUM OF UNDERSTANDING

This Memorandum of Understanding (MoU) is made and executed on day of September 2021 (effective date) at Bengaluru by and between

BEML LIMITED, a Government of India Undertaking incorporated under the provisions of Companies Act, 1956, having its Corporate Office at BEML SOUDHA, 23/1, 4th Main, SR Nagar, Bengaluru - 560 027, Karnataka, India, represented by its Director (Defence Business), Shri AJIT KUMAR SRIVASTAV (hereinafter referred to as "**BEML**" which expression shall, unless repugnant to the context, mean and include its successors in interest and permitted assigns) of the First Part

AND

INDIAN INSTITUTE OF TECHNOLOGY, KHARAGPUR, incorporated under the Institutes of Technology Act, 1961 (Act 59 of 1961) as amended by the Institute of Technology, (Amendment) Act 1963 (Act 29 of 1963) having, its Office at KHARAGPUR (KGP), West Bengal, represented by its Director, Prof. Virendra Kumar Tewari (hereinafter referred to as "**IIT-KGP**" which expression shall, unless repugnant to the context, mean and include its successors in interest and permitted assigns) of the Second Part.

Hereinafter "**BEML**" and "**IIT-KGP**" shall be individually be referred to as "Party" and collectively as "Parties" as the context may require.

WHEREAS

BEML is a multi-technology heavy engineering Industry, engaged inter-alia in the business of design, development, manufacture and marketing of varieties of equipment and spare parts and aggregates required for Defence and Aerospace, Rail & Metro, Mining & Construction.

IIT-KGP is a premier educational and research institution of the country. IIT-KGP pursues advanced scientific and industrial research in almost all branches of engineering sciences. The institute has worked hand in hand with top industrial and government organization to set up strategic research laboratories and missions for development of next generation technologies.

Parties are interested in collaborating and co-operating with each other and desire to work together towards developing next generation Technology and in that regard parties desirous of entering into a definite Agreement, for mutual benefit and to discuss on the same, Parties wish to enter into this MoU on the terms and conditions mentioned hereunder:

NOW THEREFORE, THE PARTIES WITNESSETH AS UNDER;

ARTICLE 1: EXTENT OF CO-OPERATION

The basis of co-operation shall be such that it does not affect the individual business interests of Parties and shall be on non-exclusive basis.

ARTICLE 2: DEFINITIONS

Unless repugnant to the subject or context thereof, the following expressions with their grammatical variations herein used shall have the meanings ascribed hereunder:

"Intellectual Property Rights" means the rights to patent(s), copyright(s), design(s) and other intellectual property whatsoever (whether qualifying for registrations or not) with respect to the research work.

"New Developmental Intellectual Property" refers to intellectual property developed during the research activities under this MOU.

"Technical Information" means any and all information, confidential or otherwise, such as designs, drawings, data, process, know-how, algorithms and other information in whatsoever form, tangible or intangible, generated prior to and mutually during the execution of this MOU.

"BEML Research Fellow" (BRF) refers to (i) staff of BEML selected as per the student admission guidelines of the IIT KGP to pursue a research and/or masters degree conferred by IIT KGP from BEML; and (ii) regular research students of IIT KGP (non-BEML staff) selected to receive a BEML Research Fellow award (scholarship) in order to pursue their post doctoral program, research and/or masters degrees at IIT KGP (All BEML Research Fellows will abide by the guidelines in the student "hand book" of IIT KGP).

"Projects" means list of mutually agreed projects (to be proposed by BEML in consultation with IIT KGP) during the tenure of this MOU.

"MoA" – means Memorandum of Agreement to be executed for each specific individual research collaboration project between BEML and IIT KGP, also referred to as "research project".

ARTICLE 3: PURPOSE

The purpose of this MoU is to explore the possibility of entering into a business relationship for the areas of research interest are given in (Annexure-A) as per the discussion between the parties and to arrive at a definite Agreement (MoA).

MoA shall cover specific and detailed objectives of the project, scope of IIT KGP and BEML (deliverables from both the parties), details of equipment, instruments, software and background intellectual property that may be required for the project work (purchased / leased from open market), details and extents of specific manpower to be deployed (BEML & IIT KGP), sequence of activities (e.g.; literature survey, discussions of state-of-art of any technology, experimentation, simulation, modelling, analysis, data interpretations, validation, discussions on results, conclusion, etc).

The MoA shall spell out the intended research programme, the activities and time schedules, total duration of the project and project milestones. Names & role of principal and additional project investigators involved (from either side), other special terms & conditions (linked to milestones and part payments), date of commencement of research work and planned dates of completion of research

programme etc., (A specimen MoA blank format is attached at the end of this document).

The terms and conditions of this MoU shall be applicable to such MoAs till the agreed durations of each of the individual MoAs, Parties may extend the validity of this MoU till such time any of the MoA is still continuing.

ARTICLE 4: SCOPE OF THE PARTIES

Scope shall be defined and detailed in the definite Agreement after discussions.

ARTICLE 5: RELATIONSHIP

The relationship between the Parties is in the nature of strategic alliance and nothing contained in this MoU shall be construed so as to constitute a partnership between the Parties or so as to constitute either Party as the agent of other and both the Parties carry their own responsibilities and liabilities without any recourse to other Party.

ARTICLE 6: EXCLUSIVITY

Exclusivity shall be mutually discussed and dealt in the definitive Agreement(s) to be entered into between the parties.

ARTICLE 7: REPRESENTATIONS AND WARRANTIES

Each party represents and warrants to the other that it has full power and authority to enter into and perform its obligations under this MoU.

Each party represents and warrants to the other that it has full compliance with applicable laws.

ARTICLE 8: PRODUCTS

For the purpose of this MoU, Product shall mean and include:

- a) Individual projects will be identified by IIT KGP and BEML after discussion and mutual agreement. The project proposal will be submitted jointly by investigators from IIT KGP and BEML. BEML will provide grants in aid to IIT KGP as per the approved budget of the individual projects.
- b) During project formulation, faculty members from IIT KGP may visit BEML for technical interactions. BEML will provide free hospitality and reimburse the travel cost for the visiting faculty members.
- c) BEML will interact with IIT KGP and facilitate transfer of Technology, as required. BEML will identify officers for continuous interaction with these research groups on a long term basis.
- d) IIT KGP will form necessary programme groups in each field comprising faculty members from IIT KGP along with officers from BEML
- e) General Manager/Deputy General Manager, Research & Development will be the coordinator for BEML, whereas Dean, Sponsored Research Industrial & Consultancy will be the coordinator for IIT KGP.

9. FINANCIAL TERMS

(i) Project cost and charges

The project cost includes inter-alia payment to technical and non-technical staff, expenses for equipment utilization, IIT-KGP's overhead costs, cost of local and out station travel, accommodation, contingencies, taxes, additional taxes (like CESS etc), duties and other costs not expressed or identified.

Payment, will be made to IIT-KGP, for each MOA as per the mutually agreed terms under each MOA.

The completion of project shall be marked by furnishing detailed project report where necessary, specific document(s) detailing the findings and recommendations where necessary.

(ii) Grant / Fellowships

To carry out work within the specified duration, IIT-KGP is free to engage personnel who would be engaged exclusively for an identified project. These employees are not BRF's and will be paid from the project grants. BRF's identified to work on

projects related to this MOU can be working on a masters, doctoral or post doctoral program of IIT-KGP as per IIT-KGP rules and regulations. The BRF shall not engage themselves with any other project/ activity at IIT-KGP and shall solely work for BEML identified project.

BRF's identified under specific MoAs will be paid their scholarship or fellowship grant from project grants until the tenure of the project. Payments to BRF's shall be made by IIT-KGP from the funds received from BEML. The decision regarding the grant amount for a BRF will follow the IIT-KGP guidelines for research students.

10. INFRASTRUCTURAL FACILITIES:

The academic courses and a large part of Research Project shall be carried out at IIT-KGP. The BRF may also carry out additional research work at BEML utilizing available facilities, if required.

All BRF's will follow the discipline and academic performance required of an IIT-KGP student as per the guidelines in the student handbook of IIT-KGP.

As in the case of all students of IIT-KGP, the BRF will be permitted access to all resources required to complete his or her thesis.

11. PERFORMANCE EVALUATION

BEML and IIT-KGP shall jointly review the Technical Progress of the project work either half yearly or a group of milestones as per the MoA. A "Project Review Committee" consisting of concerned project managers/ supervisor from BEML / IIT-KGP may be constituted for this purpose.

BEML shall bear all costs of attending the meetings at IIT-KGP and IIT-KGP shall bear the costs associated with its representatives visiting or attending meetings held at BEML R&D. BEML / IIT-KGP shall, subject to availability, consider providing accommodation to the representatives of each other during their visit to the premises of parties.

- a) In case of unsatisfactory progression of the project as per BEML members of Project Review committee, BEML has the right to terminate the project forthwith without any further financial disbursement and in such an event, IIT-KGP shall return the unspent sum to BEML.
- b) The IIT-KGP Project Coordinator will send a project status report to BEML project review committee members. Half yearly payment would be released only after satisfactory review.

12. INTELLECTUAL PROPERTY

Parties agree to respect each other's rights to intellectual property, namely background intellectual property acquired by either party independently before commencement of the agreement. Further, the new developmental intellectual property rights that arise as a result of Research Work under various MoAs shall jointly vest with BEML and IIT-KGP. BEML shall have the right to opt a full and exclusive or non exclusive rights to commercially exploit the new developmental intellectual property rights, whichever is deemed suitable on a case to case basis and reflected in the respective MoAs.

In the case of non-exclusive licenses, IIT-KGP or BEML is free to license out such IP to any third party. Economic benefits arising out of such commercial exploitation are to be finalized separately through mutually agreed terms and conditions, as and when applicable and required, as agreed in the MoA. In the event BEML is exercising an exclusive license option, BEML shall pay IIT-KGP an upfront or a royalty for such license, the terms of which shall be determined on case to case basis and annexed hereto as an exhibit.

Any publication arising out of the Project Work shall have the prior approval of BEML's Management. Such request for approvals shall be considered and decision conveyed by BEML on priority, within a period of 60 days.

Prior to the publication of the results, all patentable invention/ results contained therein, the same shall be filed for patent registration at BEML's costs. Subsequently BEML will maintain these registered intellectual properties using its existing

infrastructure and resources (Fees, Attorneys etc). Responsibility of identification, documenting and filing for registration of such intellectual property shall rest with, BRF, project investigator, research supervisor, and relevant BEML employee. BEML will assist with the process together with the IIT-KGP IP and technology licensing office (IPTeL). BEML shall in consultation and approval from IIT-KGP IPTeL finalise the IP applications before filing for IP protection and BEML shall keep IIT-KGP informed on all the developments pertaining to the IP filing, prosecution and maintenance. In the event BEML does not take the filing forward, IIT-KGP will take the lead in filing and protection.

Subletting/outsourcing of any part of the activity of the consultancy project should be done with the consent of BEML. The grant of permission in such cases will not absolve or affect the obligation of the parties under this agreement.

13. PUBLICATIONS

IIT-KGP and its employees shall have, subject to prior written approval of BEML as stated below, the right, at their discretion, to release information or to publish and disseminate any Research Results including, but not limiting to, data, writings, or material resulting from the Project. Within this period, BEML may request IIT-KGP, in writing, to delay such publication for a maximum of a further period of thirty (30) days in order to protect the potential IP, including the patentability of any invention, and IIT-KGP shall comply with any such request so long as it is reasonable, however, IIT-KGP shall have the final authority to determine the scope and content of any publications. Such delay shall not, however, be imposed on the submission of any student thesis or dissertation.

Any publication arising out of the Project shall have the prior approval of BEML. Such request for approvals shall be considered by BEML on priority, within a period of 30 days from the date of receipt of proposed publication from, IIT-KGP for review and to ascertain whether BEML's Confidential Information is going to be disclosed by the publication. The publications would be permitted only if the authors submit a jointly signed statement stating that:

- 1) The said publication does not disclose any confidential information obtained from BEML;

2) It duly acknowledges all financial and technical support received from BEML. Requests for permission to publish to BEML/IIT-KGP should be processed and decision conveyed within a maximum of sixty (60) days from the date of receipt of request for publication. In case the publication relates to an IP, necessary steps will be taken by IIT-KGP for protection of the IPR prior to publication.

BEML shall not interfere or impose any restrictions on filing or publication of any student thesis, dissertation or any other publication right of IIT-KGP provided such publication shall not have any disclosure of confidential or proprietary information or IPR. If no reply is received within 60 days from the date on which the recommendation was sent to parties, the recommendation shall be deemed accepted.

ARTICLE 14: CONFIDENTIAL INFORMATION

14.1 The term "Confidential Information" shall mean and refer to all or any information which is disclosed by one party (Disclosing Party) to the other (Receiving Party) , including but not limited to, past, current and future customer information, proprietary, technical, financial, personnel, manpower, marketing, pricing, sales and/or commercial information for "Purpose" as well as ideas, concepts, designs, drawings and inventions, embedded hardware design, data and information, computer source and object code and computer programming techniques; and all record bearing media containing or disclosing such information and techniques which are disclosed pursuant to this MoU. Provided that if the Confidential Information disclosed by means of document or other tangible form the same shall be marked as 'Confidential ' by the Disclosing Party at the time of disclosure and If the Confidential Information is disclosed orally or visually or other intangible form, the same shall be identified by the Disclosing Party as 'confidential' at the time of such disclosure and shall be provided in writing to the Receiving Party duly marked as "confidential" within fourteen (14) days of such disclosure. If the Confidential Information is not marked with such legend, the same will not be identified as confidential Information.

14.2 The Receiving party shall not disclose the Confidential Information to any third party or to public without prior written consent of the originating/ Disclosing Party. This Obligation shall be for a period of two years from the effective date of expiry or early termination of this MoU.

14.3 The obligations of the Parties under this Article shall not be applicable to the information that:

- a) is now, or hereafter becomes, through no act or failure to act on the part of the Receiving Party, generally known or available to the public;
- b) is hereafter rightfully furnished to the Receiving Party by a third party, without restrictions to use or disclosure;
- c) is disclosed with the prior written consent of the Disclosing Party; or
- d) is required to be disclosed in pursuant to law, order of the court or Government authority, and then only to the extent ordered by the court or governmental authority, provided that the Receiving Party shall give a notice as early as possible to enable the Disclosing Party to get a protective order.

14.4 Upon the expiry or termination of this MoU or at the earlier request of the Disclosing Party, the Receiving Party shall return all Confidential Information to the Disclosing Party without retaining any copies of such Confidential Information or, if so desired by the Disclosing Party, the Receiving Party shall destroy the confidential information and shall confirm in writing that all such Confidential Information has been destroyed.

14.5 The Confidential information shall be the sole and exclusive property of the Disclosing Party.

14.6 The Disclosing Party will indemnify the Receiving Party against third party claims for infringement of intellectual property rights in respect of the use of confidential information/documents supplied by the Disclosing Party for the purpose of the MoU (The limit of liability for indemnification shall be 70 % of the

total project cost paid to IIT KGP for the project under which the cause of indemnification arises).

ARTICLE 15: FORCE MAJEURE:

15.1 Neither Party shall be in default of its obligation under this MoU, by reason of its delay in the performance of, or failure to perform, any of its obligations herein above, if such delay or failure is caused by any event or condition which is beyond the control of the Parties, including, without limitation, an Act of God, war, civil commotion, terrorist act, labour strike or lock-out, epidemic, failure or default of public utilities or common carriers, destruction of facilities or materials by fire, earthquake, storm or like catastrophe and failure of systems / machinery (provided that such failure could not have been prevented by the exercise of skill, diligence and prudence that would be reasonably and ordinarily expected from a skilled and experienced person engaged in the same type of undertaking under the same or similar circumstances). Force Majeure situation shall also include any judicial pronouncements or change in the Applicable Laws or a delay in any approval from a Government Authority which may prevent a Party from carrying out its obligations in accordance with this MoU;

15.2 The Party invoking this Clause shall satisfy the other Party of the occurrence of such an event and give written notice explaining the circumstances, within 7 (Seven) days to the other Party and take all possible steps to revert to normal conditions at the earliest. In case the Force majeure continues for a period over six months from the date of said Notice, notwithstanding the provisions contained in the Article -16 below, the Parties are free to terminate the MoU.

ARTICLE 16: TERM and TERMINATION

16.1 This MoU shall be valid for a period of Three (03) years from the effective date and may be extended for a further period on mutual agreement of the Parties.

16.2 This MoU shall, unless otherwise extended by mutual agreement of the Parties, terminate upon happening of any of the following events:

- (a) Termination by mutual consent;
- (b) Termination by either party due to breach of any of the covenants hereof by the other by giving three months prior notice in writing to the defaulting Party and the defaulting party fails to rectify the breach within the notice period;
- (c) by giving written notice of 30 days in the event of the liquidation, bankruptcy, reorganization, dissolution or insolvency of the other Party resulting in that Party's inability to perform the obligations under this MoU;
- (d) by either party by giving 90 days written notice to the other with or without attributing reasons.

16.3 In case of early termination due to any reasons above mentioned, BEML shall pay the committed expense of IIT KGP due till the date of termination to IIT KGP).

Notwithstanding the above, termination shall not prejudice any rights and obligations of the Parties that has arisen prior to the effective date of termination.

ARTICLE 17: GOVERNING LAW & JURISDICTION

This MoU shall be governed by the laws of Republic of India. The courts at Kolkata, India shall have exclusive jurisdiction to deal with any matter arising out of or relating to/in connection with this MoU.

ARTICLE 18: DISPUTE SETTLEMENT

18.1 Disputes, if any, arising between the Parties in connection with this MoU or any other matters connected therewith, will be mutually discussed and amicably settled between the parties by conciliation/negotiation. The unresolved dispute(s) shall be referred to Arbitral Tribunal consisting of a sole

Arbitrator to be mutually appointed by the Parties. If parties fail to reach a mutual agreement, the sole Arbitrator shall be appointed in accordance with the Provisions of Arbitration and Conciliation Act, 1996. The proceedings of the Arbitration shall be in accordance with the provisions of Arbitration and Conciliation Act, 1996, as may be amended from time to time. The award of the Arbitral Tribunal shall be final and binding upon the parties to the dispute.

18.2 The venue of the Arbitration proceedings shall be at Kolkata, India, and the language shall be English.

ARTICLE 19: NOTICE AND CONTACT PERSON

19.1 Any notice or communications between BEML and **IIT-KGP** shall be made in writing in the English language and sent by registered mail or e-mail or fax immediately confirmed in writing by registered mail in the last two cases and it will be considered as valid from the date of its receipt by the receiving Party. Any notice or communications addressed to the Parties in connection with this MOU shall be addressed to the following.

BEML Limited:

Shri Ajit Kumar Srivastav
Director (Defence Business)

IIT-KGP:

Prof. Suman Chakraborty
Dean, SRIC

19.2 Either Party shall be entitled to replace their authorized person or the address for communication at any time by duly notifying the other Party in writing. The change becomes effective at the moment when the other Party gets to know about it.

ARTICLE 20: ASSIGNMENT

Neither Party shall under any circumstances delegate, assign or transfer to third party the duties and obligations contracted hereunder, without the prior written consent of the other Party. It is expressly understood and agreed that the Parties shall remain solely responsible for all obligations assumed by it under this MOU, without regard to any such delegation, assignment or transfer.

ARTICLE 21: AMENDMENTS

No modification to, amendment of, or waiver of any provision of this MoU will be binding, unless the same is made in writing and signed by the parties or by their expressly authorized representatives.

ARTICLE 22: APPROVALS

Any statutory requirement and/or compliance under the respective laws in force for the purpose of this MoU shall be the responsibility of respective Parties. Parties shall obtain all approvals, licences, permissions, consents, etc. as may be required for the performance of obligations under this MoU.

ARTICLE 23: NON-SOLICITATION

No Party shall, either directly or indirectly, on its own behalf or on the behalf of others, solicit or hire for work any person(s) employed by the other Party, whether or not such employment is pursuant to a written contract or is at will, without the express written permission of such other Party, or until such employee has ceased his/her employment with such other Party for at least two (2) years. This clause shall be effective for a term of three (3) years from the date of termination of this MoU

ARTICLE 24: SEVERABILITY AND WAIVER

If any provision of this MoU is held to be invalid or unenforceable for any reason, the remaining provisions shall continue in full force without being impaired or invalidated

in any way. The Parties shall replace any invalid provision with a valid provision, which must closely approximate the intent and effect of the invalid provision. The waiver by the Party of a breach of any provision of this MoU shall not operate or be interpreted as a waiver of any other right or obligations under the provision of this MoU.

ARTICLE 25: MISCELLANEOUS

25.1 Each Party will bear its own costs and bear their respective expenses and shall not cast any commitment or any financial obligation on parties in connection with the performance and execution of this MoU and its implementation unless otherwise agreed to by prior mutual agreement between the Parties.

25.2 Notwithstanding anything to the contrary provided in this MoU, neither Party shall be liable to the other Party for any special, speculative, punitive, indirect, incidental, consequential loss and/ or damages of any kind (in contract or in tort), but not limited to loss of profits, loss of anticipated profit, loss of revenue, loss of income, loss of data, loss of business, loss of reputation as well as loss of financing cost or increased cost of operations or damages incurred.

25.3 This MoU contains the entire understanding of the Parties hereto with respect to the subject matter hereof and supersedes all prior agreements, understandings, oral and written, and commitments relating to the purpose mentioned above. Neither Party has relied upon any representation, express or implied, not contained in this MoU.

25.4 This MoU may be executed in one or more counterparts each of which when executed and delivered shall constitute one original but all of which shall together constitute one and the same instrument.

25.5 This MoU shall be binding upon, and shall insure to the benefit of, the parties hereto and their respective successors and permitted assigns.

25.6 Each Party agrees to execute and deliver all such further instruments, and to do and perform all such further acts and things, as may be necessary or convenient to implement the provisions of this MoU.

25.4 Parties declare and agree that in connection with activities under this Agreement they have not performed or will not perform any act which would constitute a violation of any applicable anticorruption laws and/or regulation or which would cause either Party hereto to be in violation of the relevant anticorruption laws.

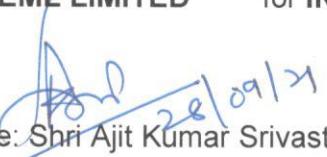
25.5 Each party shall use its best endeavour to ensure that all acts, deeds and things as are necessary for due fulfilment of any obligation mentioned hereinabove are fulfilled with the agreed time frame.

25.6 This MoU supersedes all prior communications, proposals, speeches, communications or agreements, understandings and contracts concluded in relation to the subject-matter hereof, whether in writing or oral.

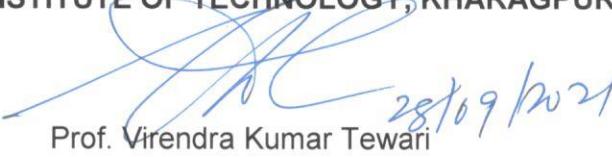
25.7 It is the understanding between the parties that this MoU is solely between the parties and Government of India or Ministry of Defence is not a party and thus cast no obligation on them whatsoever under this MoU.

IN WITNESS WHEREOF the Parties hereto have agreed to sign this MoU by their respective duly authorized representatives hereunto as of the day, month and year stated herein above.

for **BEML LIMITED**


Name: Shri Ajit Kumar Srivastav
Director (Defense Business)

for **INDIAN INSTITUTE OF TECHNOLOGY, KHARAGPUR**


Prof. Virendra Kumar Tewari
Director

WITNESSES

1) Signature



Name: SUMANTA KUMAR SAHA Name: AMIT PATRA

Address: BEML, Bangalore

Address: IIT Kharagpur

2) Signature



Name:

JAYANTA MUKHOPADHYAY

Address: IIT Kharagpur

2) Signature



Name: SUMAN CHAKRABORTY

Address: IIT Kharagpur