# **Revised Guidelines** For

# The Scheme of Research & Development In Processed Food Sector

during 12<sup>th</sup> Plan Period (with effect from 01.04.2013)

Government of India Ministry of Food Processing Industries Panchsheel Bhawan August Kranti Marg New Delhi - 110 049

F.No.125/R&D/12

Dated 03.03.2014

# MINISTRY OF FOOD PROCESSING INDUSTRIES

# **Revised Guidelines For The Scheme of Research & Development In Processed Food Sector During 12<sup>th</sup> Plan Period (with effect from 01.04.2013)**

# 1. INTRODUCTION

Ministry of Food Processing Industries (MFPI) extends financial assistance as grantin-aid to various institutions/universities, Public funded organizations and recognized R&D laboratories both in public and private sector, to promote and undertake demand driven R&D work in the field of Food Processing Sector for product and process development, design and development of equipment, improved storage, shelf-life, packaging etc.

From 1<sup>st</sup> April, 2012 the scheme is being implemented by the Science & Engineering Research Board under the Department of Science & Technology, Ministry of Science & Technology, Technology Bhawan, New Mehrauli Road, New Delhi – 110 016.

# 2. OBJECTIVE

Objective of the scheme is that the end product / outcome / findings of R&D work should benefit Food Processing Industry in terms of product and process development, improved preservation, packaging, storage and distribution technologies, value addition, standardization of additives, coloring agents, preservatives, pesticide residues, etc. with focus on enhancement of production, quality, consumer safety, public health and trade.

# 3. ELIGIBLE INSTITUTIONS

All Universities, IITs, Central/State Government Institutions, Public Funded Organisations, R&D laboratories and CSIR recognized R&D units in private sector.

# 4. ELIGIBLE PURPOSES

4.1 Ministry supports research proposals preferably of applied nature with commercial value resulting in development of innovative products, processes and manufacturing practices, which lead to development of food processing industry in the country.

4.2. Ministry also supports basic research which adds to scientific knowledge relevant to the Food Processing Sector.

#### 5. FUNDING PATTERN

5.1 For the Government organizations/universities/institutions, grant is given for the following:

- i) 100% of cost of equipment, consumables and expenditure related to Junior Research Fellow/Senior Research Fellow /Research Associate (JRF/SRF/RA) specific to the project of specified duration for maximum of three years. No assistance will be provided for already existing equipment. Research Assistant(s)/ Project Assistant(s) may be engaged as an alternative to JRF/SRF/ Research Associate. The emoluments for such Research Assistant(s)/ Project Assistant (s) will be as per norms of applicant institution but not exceeding the scale laid down for Junior Research Fellow (JRF) of ICAR.
- (ii) Lump sum provision up-to Rs.1 Lakh for TA/ DA for project related travel like survey, data/sample collection, etc. and for attending the meetings of the Expert Committee to present the project proposal and subsequently for the project review presentation. TA/DA will be given for an approved project only. The amount could be increased with specific approval of Project Approval Authority for reasons to be recorded.
- (iii) Institutional Charges equal to 10% of project cost subject to maximum of Rs. 3 lakh for non-academic institutions and Rs. 5 Lakh for academic institutions.
- 5.2 For Private organizations/universities/institutions, grant is given to the tune of 50% of equipment cost in general areas and 70% in difficult areas.

- 5.3 Difficult areas include J&K, Himachal Pradesh, Uttarakhand, Sikkim, North-Eastern States, Andaman & Nicobar Islands, Lakshadweep, and Integrated Tribal Development Project (ITDP) areas.
- 5.4 100% Grant is provided for the Ministry's sponsored projects, restricted only to public funded organizations of repute, in cases of cutting edge areas of research leading to development of innovative products, processes, manufacturing practices and technology.

# 6. HOW TO APPLY

- 6.1. The Principle Investigator (P.I.) may submit research proposal (three copies along-with a soft version) in prescribed standard proforma (ANNEXURE-A) to Secretary, Science and Engineering Research Board, 5 & 5A, Lower Ground Floor, Vasant Square Mall, Sector-B, Pocket-5, Vasant Kunj, New Delhi-110070. Applications for research grants can be submitted at any time during the year.
- 6.2. The application should be forwarded, through the Head of the concerned institution duly certified that (i) the required facilities (viz: land, buildings, laboratory, manpower and other infrastructure etc) are available and will be provided to the investigator(s) to work on the proposed project, and (ii) the department/university/institute will discharge all its obligations, particularly in respect of management of the grant given and patenting as well as commercialisation of the end product.
- 6.3. Three hard copies and one soft copy of the project proposal must be submitted along with the supporting documents (viz: 1. An affidavit / undertaking duly notarized/verified by Competent Authority / Head of the organization in compliance with Rule 209 (1) of GFR 2005 [ANNEXURE-E], 2. A consent letter from industrial partner, if any, confirming that the outcome of the research will be taken up/purchased /commercialized by that industrial partner).

4

- 6.4. Depending on the magnitude and nature of research involved a research project may have more than one investigator and, in such a case, the first investigator shall be known as "Principal Investigator" (PI). In the event of a collaborative project involving two or more institutions, the consent of each institution must be furnished with the proposal.
- 6.5. Research proposals must be prepared after extensive and exhaustive consultation of available literature and references to ensure that there is no duplication of work. Proposals will be considered only when the end product is new, innovative, and has commercial value or has relevance to Food Processing Sector.

# 7. PROCEDURE FOR APPROVAL OF PROPOSALS

- 7.1. SERB will evaluate the proposals comprising of peer review and/ or evaluation by an Expert Committee. In case of private sector research proposals, the concerned State Food Processing Mission Director may be invited to attend the Expert Committee meeting for consideration of such proposals. List of the State Directors for the National Mission on Food Processing is available on the website of the Ministry of Food Processing Industries (MFPI).
- 7.2. After approval of the competent authority, in-principle approval of the project proposal for the approved grant amount will be conveyed to the applicant university/institute/organization and after fulfillment of all the required criteria, sanction will be issued for release of first/second/third installment of grant as per these orders.

# 8. **PROCEDURE FOR RELEASE OF FUNDS**

- 8.1 Release of Funds:
- 8.1.1. Release of funds for Government/Public Funded Organizations:
  - a. After fulfillment of all the required criteria as per para. 8.2.1 (a), first installment of grant comprising (a) 100% of the approved cost of

equipment (or as required by the applicant research organization), (b) 50% of the approved cost towards JRF / SRF / RA / Research Assistant / Project Assistant, (c) 50% of the approved cost towards consumables, (d) 50% of the approved cost towards TA/DA, and (e) 50% of the approved institutional charges will be released.

- b. After fulfillment of all the required criteria as per para. 8.2.1(b), second installment of grant comprising (a) 40% of the approved cost towards JRF/SRF/RA/ Research Assistant / Project Assistant, (b) 40% of the approved cost towards consumables, (c) 40% of the approved cost towards TA/DA and (d) 40% of the approved institutional charges will be released.
- c. After fulfillment of all the required criteria as per para. 8.2.1(c), third/ final installment of grant comprising (a) 10% of the approved cost towards JRF/SRF/RA /Research Assistant / Project Assistant, (b) 10% of the approved cost towards consumables, (c) 10% of the approved cost towards TA/DA and (d) 10% of the approved institutional charges will be released.

# 8.1.2. **Release of funds for Private Organizations:**

- a. After fulfillment of all the required criteria as per para.8.2.1 (a), first installment of grant comprising 50% of total grant approved for equipment will be released.
- b. After fulfillment of all the required criteria as per para.8.2.1 (b), second installment of grant comprising of 40% of the total grant approved for equipment will be released.
- c. After fulfillment of all the required criteria as per Para.8.2.1(c), final installment of grant comprising 10% of the approved grant for equipment will be released.

# 8.2. **Documents required to be submitted before each release:**

- 8.2.1. Documents required for release of funds:
  - a. Documents required for release of 1<sup>st</sup> Instalment:
  - i. Compliance with the standard conditions as per Annexure- F.
  - Govt. / Public Sector Organizations /Universities/ Institutions shall submit copy of quotation(s) for the equipment to be procured out of grant-in-aid.
     Private organizations / universities / institutions shall submit copy of the quotations alongwith the purchase order for the equipment to be procured out of 1st instalment.
  - iii. Consent of the industrial partner, if any, confirming that the outcome of the research will be taken up/purchased/ commercialized by that industrial partner.
  - iv. Submission of an affidavit/undertaking in compliance with Rule 209(1) of GFR 2005 (ANNEXURE-E).
  - v. Submission of notarized surety bond of Rs. 100/- in case of private organizations / universities / institutions (ANNEXURE-G). (As per Rule 209 (6) (x) of GFR 2005, execution of surety bond will not apply to quasi-Government institutions, central autonomous organizations and institutions whose budget is approved by Government.)
  - b. **Documents required for release of 2<sup>nd</sup> Installment**:
  - i. Utilization Certificate (Annexure-D) as per Rule 19 (A) of GFR-2005 along with the statement of expenditure (issued by the Competent Authority) clearly bringing out the expenditure incurred by the applicant university/institute/organization from their own internal resources and from the assistance provided by MFPI, with detailed breakup.

- ii. In case of Government Organization/ Institute/ University where <u>100% cost</u> of equipment grant is released in 1<sup>st</sup> instalment, the applicant University/Institute/organisation must submit the copies of purchase order/invoice for whole equipment as approved by Technical Committee, alongwith statement of expenditure and progress report
- iii) In case the applicant University /Institute/organization opts for release of less than 100% of cost of equipment grant in the  $1^{st}$  instalment, the applicant University / Institute/organisation must submit the copies of invoice/bill of equipment purchased out of  $1^{st}$  intalment grant alongwith quotation for equipment to be purchased out of  $2^{nd}$  instalment grant with statement of expenditure and progress report.
- iv) Further, in case of private organizations / institutions, they should submit copies of purchase order for the equipment to be purchased out of second instalment alongwith statement of expenditure and progress report.
- c. Documents required for release of 3<sup>rd</sup> and final instalment:
- i. Submission and acceptance of Final Project Completion Report (FPCR) in the prescribed format i.e. as per Annexure- C.
- ii. Utilization certificate (Annexure-D) as per Rule 19 (A) of GFR-2005 along with the statement of expenditure (issued by the Competent Authority) clearly bringing out the expenditure incurred by the applicant university/institute/organization from their own internal resources and from the assistance provided by MFPI, with detailed breakup.
- iii. In case of Private Organiztion/ Institute they should submit copies of invoice/bill for PAC approved equipment, as also duly audited accounts indicating that the entire expenditure has been incurred on the purchase of the PAC approved equipment.
- 8.3. The findings of the project shall be made available (preferably with the demonstration) before the appraising team as and when required.

## 9. FINAL PROJECT COMPLETION REPORT (FPCR)

- 9.1. The applicant university/institute/organization must submit the FPCR in prescribed format as per (ANNEXURE-C) and shall also discuss how the technology is going to be commercialized, patented and its future potential for technological advancement. The details of scientists/scholars trained and expertise developed, their qualification along with the permanent address shall also be mentioned in the FPCR.
- 9.2. The PI is required to submit FPCR (ten copies) for the entire duration, within three months from the date of completion of the project. The report must be in detail and should include information about (a) the original objective(s) of the scheme, (b) how far these objective(s) have been achieved, and (c) how the results have benefited the country's technological development or enriched the existing knowledge pool on the subject. The actual research achievements made under the scheme may be summarized in about 200 words and mentioned in the FPCR to facilitate publication of the same by MFPI/SERB and for making available on the website of SERB and MFPI.
- 9.3. Copies of manuscripts, preprints and reprints of papers arising from the work completed under the scheme should be attached to the FPCR. Failure to submit the FPCR on completion of the scheme will disqualify the investigator from seeking further assistance from MFPI. The names of defaulting Principal Investigators (P.Is.)/Institute will be circulated to all the funding agencies and this may lead to the concerned Investigators/Institute not getting any assistance for his/her new projects in future.

## 10. TENURE, PROGRESS REPORT

10.1. The tenure of a project would normally be 3 years or less as proposed by the investigator. Expert Committee (EC) of SERB will evaluate the progress of schemes to ensure that the funds are effectively utilized as per the intended objectives. For this purpose Principal Investigators (PIs) are required to submit a comprehensive progress report as per the format (ANNEXURE- B) as and when demanded by SERB, normally after one year. In case of some deserving cases depending upon the satisfactory progress, SERB may extend the project period to

one more year on a case-to-case basis without any financial implication.

10.2. Progress of the project will be monitored through progress report submitted or onsite inspection (if required) of the project or presentation before the review committee.

# 11. RESULTS OF RESEARCH AND INTELLECTUAL PROPERTY(IP) RIGHTS

- 11.1 Investigators are encouraged to seek legal/patent protection for the outcome of research.
- 11.2 Investigators are also encouraged to publish the results of research only after filing the necessary relevant IP protection applications. While doing so, acknowledgement to the effect that financial assistance was received from MFPI should be made in the research paper(s) published. MFPI should be acknowledged in similar type of other published work/press reports (please note: releasing to the press before IP protection may invalidate the prior art of the invention as it becomes known to public).
- 11.3 Project Investigators (PI) are encouraged to avail assistance for filing and obtaining patents for research outcome of MFPI assisted projects through Technology Information, Forecasting and Assessment Council (TIFAC), an autonomous organization under the Department of Science & Technology. Patent Facilitating Centre (PFC) under TIFAC will facilitate filing and obtaining patents for academic institutions and universities without any charges as MFPI will make necessary arrangement for the same directly with PFC, TIFAC. The interested PIs/ organizations may apply to: The Head, Patent Facilitating Centre (PFC), TIFAC, 5<sup>th</sup> Floor, A-wing, Vishwakarma Bhavan, Sheedjeet Singh Marg, New Delhi-110016 Tel No. 011-4242808/26967458, Email: dirpfc.tifac@gmail.com for this purpose as per the guidelines of PFC. Copies of such applications may also be endorsed to the Ministry (in such case only MFPI endorsed applications would be entertained by FPFC).

- 11.4 While PI is recognized as inventor, the title to the patent, or other legal protection accorded to the results of research, shall vest with University/Institute.
- 11.5 Ministry of Food Processing Industries will reimburse the administrative and other charges, if any, to PFC,TIFAC on this account.
- 11.6 Private institutions may also avail the benefit of this scheme for filing and obtaining patents through PFC,TIFAC under DST, provided they are registered as educational society under the Societies Act.

# **12. OPERATION OF FUNDS**

The general conditions to be complied for operation of the funds are as follows:

- i) The applicant organization must submit utilization certificates for the amount released as 1<sup>st</sup>, 2<sup>nd</sup>, 3<sup>rd</sup> installment as per Form GFR19-A alongwith the detailed statement of the expenditure certified by the Accounts Officer and countersigned by the Finance Officer/ Registrar / Administrator of the university/institute/organization/ Head of the Department or Chartered Accountant (as required) should be submitted to SERB as indicated in ANNEXURE-D.
- Any unspent balance from earlier payment lying with the Institution at any time due to termination/resignation of the Fellow, etc. must be refunded to SERB immediately by means of demand draft in favour of Fund for Science & Engineering Research. In case the unspent balance is not returned within three months, it will attract interest as per the existing General Financial Rules (GFR 2005).
- iii) University/institute/organization receiving grants will have to maintain separate accounts for each research project on ledger type system.
- iv) The released grant shall not be diverted or spent other than for what it has been approved or otherwise may be got approved from SERB before such expenditure.

- v) All equipment purchased out of the grant will be the property of the Government of India and have to be entered into the Stock Register maintained by the University/Institution and also in a separate Register maintained by the project Investigator and certified by the Head of the Department.
- vi) The university /institute /organization will be responsible for the safe custody of the equipment purchased out of the grant.
- vii) Items of equipment should be purchased following a transparent, fair and competitive tender system.
- viii) A list of equipment purchased is to be appended with the application for  $2^{nd}$  instalment. The name, description of the equipment, cost in rupees, date of purchase, and the name of the supplier, may be given in the list. The main purpose/function of the equipment may also be mentioned against each item. Equipment should be purchased within 4 months from the date of receipt of the sanction letter of respective installments, otherwise the grant will be liable to be cancelled and be called back.
- ix) After the termination of project, the University/institute/organization may retain all the equipment purchased for the purpose of the project out of MFPI grant. A label with the legend "MFPI FUNDED" shall be stuck prominently on the equipment.
- x) The research carried out withhe financial assistance of MFPI shall be in public domain. The facilities created thereof may be utilized as Business/R&D Incubation Centre after the research is completed for testing/research/product development, etc by other institutes/ organizations on payment basis.
- xi) The books of accounts of the grantee institution shall be open to inspection by the sanctioning authority/audit and by any other authority specified by the Ministry, whenever the institution is called upon to do so.

## 13. OBLIGATIONS OF PRINCIPAL INVESTIGATOR

The following are the obligations of the PI of a research scheme:

- i) The sanctioned research scheme must commence within 4 months from the date of receipt of the sanction letter of first instalment, unless otherwise authorized by SERB, failing which the grant will be liable to be cancelled and be called back.
- ii) It is mandatory for the PI/Co-PI to come to the Progress Review Presentation when invited to present the progress of the work done on the scheme.
- iii) Acknowledgement of the support given by MFPI in all the publications arising from the work done under the scheme. MFPI should be acknowledged in similar type of other published work/press reports etc.
- iv) Submission of the final project completion report (ANNEXURE-C) within 3 months of completion of the project, describing original objective(s), how far these objective(s) have been achieved and how the results have benefited the technological development or enriched the existing knowledge on the subject and enclosing manuscripts, preprints and reprints of the papers arising from the scheme.
- v) Claim for any dues must be made immediately. Submission of the utilization certificate and audited statement of accounts for the grants paid and to arrange refund of unspent amount of the grant must be made immediately on completion of the project. Claim of bills in any case will not be entertained after six months of the completion of project.
- vi) Sending of one reprint of each research paper(s) published as a result of the work done under the MFPI grant to SERB and R&D Division of MFPI as and when published. (Please ensure that in case you desire to file a patent, it must be done before publishing the results).
- vii) In the event of a PI proceeding on leave or takes up an assignment, alternative arrangements shall be made by the organisation, so that project does not suffer.

# 14. INDEPENDENT ANNUAL EVALUATION

Ministry will subject the scheme for evaluation by appointing an independent agency.

**Note**: These terms and conditions supersede all previous instructions issued in regard to R&D scheme. In all matters, decision taken by Secretary, MFPI will be final.

#### ANNEXURE-A

#### FORMAT FOR SUBMISSION OF PROJECT

(To be filled by applicant)

1. Project Title

2. Broad Subject:

- I. Product development
- **II.** Processing
- III. Packaging
- IV. Equipment Design and Development
- V. Storage
- VI. Shelf Life
- VII. Any other (Please specify)
- 3. Duration in months
- 4. Total cost
- 5. FE Component
- 6. Principal Inv.
- 7. Designation
- 8. Department
- 9. Institute Name

10. Address

- 11. Date of Birth: Sex (M/F)
- 12. Telephone / Fax / E-mail
- 13. Co-Investigator
- 14. Designation
- 15. Department
- 16. Institute Name

17. Address

18. Date of Birth: Sex (M/F)

19. Telephone / Fax / E-mail

(Repeat 13 to 19 for additional Co-Investigators, if any, as 13.1-19.1, 13.2-19.2,.)

20. Project summary (maximum 150 words)

- 21. Key words (maximum 6)
- 22. Technical details
  - 22.1. Introduction (under the following heads)
    - 22.1.1. Origin of the proposal
    - 22.1.2. Definition of the problem
    - 22.1.3. Objectives
    - 22.1.4. Process/Technology/design of any new machinery and products to be developed including by-products, if any:
    - 22.1.5. Uses of products and by-products:
    - 22.1.6. How demand is being met-indigenous / imported:
    - 22.1.7. Salient features of existing technology/manufacturing problems and technological gaps:
    - 22.1.8. Details of new or improved technology to be developed:
    - 22.1.9. Demand assessment for both domestic and export markets
- 22.2. Review of status of Research and Development in the subject
  - 22.2.1. International status
  - 22.2.2. National status
  - 22.2.3. Novelty Importance of the proposed project in the context of current status
  - 22.2.4. If the project is location specific, basis for selection of location.
- 23. Target beneficiaries of the proposed work
- 24. Review of expertise available with the PI, the proposed investigating group/institution in the subject of the project

- 24.1. Preliminary work already done on the project. Status of research / development by the organization or at the collaborating research laboratory, if any, their scope of work and role in the present project.
- 24.2. Industry partner who has shown interest in R&D and its results and their financial contribution, if any. Kindly give name and address of the industrial unit who are interested in this Research Work along with their consent letter.
- 24.3. If applicant is an industrial unit linked with an R&D institution that may provide technical input, please furnish signed agreement.
- 24.4. Brief history of the Institution / Industrial firm including products being made, capacities, related collaborations, achievements, R&D capabilities, etc. (latest annual report and company brochure may be given):

24.5. Details of the Institute:

(a) Status of the Institute:
Public funded
Public funded
Industry
Academic Institute
Research Lab
C
Private University
Private College
Private Research Lab
C

- (b) Whether Institution is a CSIR/ICAR/ICMR/SAU organization
- (c) Whether In-house R&D unit of the firm is recognized by DSIR, Ministry of Science & Technology
- (d) Please indicate recent major achievements of In-house R&D unit of the Industrial firm in development of new products/processes, indigenous development of capital goods, absorption, adaptation and up gradation of the imported technology, if any.
- 24.6 Details of the manpower available (Give separate details for Executive and Collaborating Agencies).

a)	Ph. Ds -	
	Engineers	-
	Scientists	-
	Post/graduates	-
	Total S&T Manpower in the R&D Unit	-

- b) Number of other staff in R&D unit (Technical/Non-Technical)
- Financial capabilities of the Executing Agency (in case of Private Institutes other than universities)
  Please provide Memorandum & Articles of Association of the company, Annual Reports for the last 3 years, sources of financing the proposed project and financial commitment letter from the competent authority for undertaking the proposed project.
- 25. Patent details (domestic and international), if applicable
- 26. Sustainability: Issues relating to sustainability, including stakeholder commitment, operation and maintenance of assets after project completion, and other related issues.

#### 27. Work plan

- 27.1 Methodology
- 27.2 Organization of work elements
- 27.3 Time schedule of activities giving milestones (bar diagram)
- 27.4 Do the physical and financial targets (given in section 30) match with each other
- 27.5 Suggested plan of action for utilization of research outcome expected from the project.

28. The development "Outcomes" and "Outputs' of the project (This may include broad details of relevant aspects)

- 28.1 Expected number of prototypes / pilot plant.
- 28.2 Expected optimization / improvements in products / process

design/performance, etc.

- 28.3 Improvements in productivity, yields, efficiencies / quality, value added etc. / (to be quantified)
- 28.4 Any other benefits
- 29. Economic implications of the proposed work, if any.

#### **30. BUDGET ESTIMATES:**

# **30.1. BUDGET SUMMARY FOR THE GOVERNMENT ORGANIZATIONS / UNIVERSITIES / INSTITUTIONS:**

SI.No.	Item		Budget				
		1 <sup>st</sup> Year	2 <sup>nd</sup> Year	3 <sup>rd</sup> Year	Total		
А	Non-recurring (Capital	Items)					
Ι	Pmt Equipment						
В	Recurring (General)						
Ι	Salaries						
II	Consumables						
III	TA/DA						
IV	Institutional Charges						
	Total (General)						
С	Grand Total						

\*FEC- Foreign Exchange Component

Foreign Exchange component (in US\$) equivalent of rupee amount at the prevailing rates may be furnished.

30.1.1. BUDGET FOR SALARIES/WAGES

		BUDGET			(in Rupees)
		1st Year	2nd Year	3rd Year	Total (m.m.)
		(m.m.*)	(m.m.)	(m.m.)	10000 (111111)
Designation & number of persons	Monthly Emoluments				
Total					

\*m.m.:man months to be given within brackets before the budget amount

30.1.2. Justification for the manpower requirement.

# 30.1.3. BUDGET FOR CONSUMABLE MATERIALS

# BUDGET(in Rupees)Item1st Year2nd Year3rd YearTotal $Q^*$ $\square$ $\square$ $\square$ $\square$ $B^{**}$ $\square$ $\square$ $\square$ $\square$ $F^{***}$ $\square$ $\square$ $\square$ $\square$ TotalB $\square$ $\square$ $\square$ F $\square$ $\square$ $\square$ $\square$

\*Q: Quantity or number, \*\* Budget, \*\*\*F: Foreign Exchange Component in US\$

## 30.1.4. Justification for consumable materials

#### 30.1.5. BUDGET FOR TA/DA

	BUDGET			(in Rupees)
	1st Year	2nd Year	3rd Year	Total
Travel (Only inland travel)				

30.1.6. Justification for intensive travel, if any.

#### 30.1.7. BUDGET FOR EQUIPMENT

S1.	Generic name of the		Estimated Costs	Spare time for
	Equipment along with make	Imported/Indigenous	(in Foreign	other users (in
No.	& model		Currency also)*	%)

30.1.8. Justification for the proposed equipment.

## **30.2. BUDGET SUMMARY FOR PRIVATE ORGANIZATIONS**

	Sanction head	Amount in Rs.
A	Non-recurring (Capital Items)	
	Pmt Equipment	
A'	Total (Capital)	
	SERB/MFPI Contribution (50% of A')	
	Institute Contribution (50% of A')	

## 30.2.1. BUDGET FOR EQUIPMENT

S1.	Generic name of the		Estimated Costs	Spare time for
51. No.	Equipment along with make &	Imported/Indigenous	(in Foreign	other users (in
10.	model		Currency also)*	%)

\* includes transport, insurance and installation charges.

30.2.2. Justification for the proposed equipment.

31. Time Schedule of Activities through BAR Diagram

32. List of facilities being extended by parent institution(s) for the project implementation.

A) Infrastructural Facilities:

Sr. No.	Infrastructural Facility	Yes/No/ Not required Full or sharing basis
1.	Workshop Facility	
2.	Water & Electricity	
3.	Laboratory Space/ Furniture	
4.	Power Generator	
5.	AC Room or AC	
6.	Telecommunication including e-mail & fax	
7.	Transportation	
8.	Administrative/ Secretarial support	
9.	Information facilities like Internet/ Library	

10.	Computational facilities	
11.	Animal/ Glass House	
12.	Any other special faciity being provided	

B. Equipment available with the Institute/ Group/ Department/ Other Institutes for the project:

			Remarks including
Equipment available	Generic Name of	Model, Make & year of	accessories available
with	Equipment	purchase	and current usage of
			equipment
PI & his group			
PI's Department			
Other Inst in the region			

- 33. Detailed Bio-data of the Investigator(s)/Co-Investigator(s)
  - Name, Address, Date of Birth, Institution's Address etc.
  - Academic Qualifications (University/College from where attained, year of passing, class, Thesis title etc.)
  - Publications list (Title of paper, authors, Journal details, pages, year etc.) Patent list, if any
- 34. Details of Research Projects being implemented/ completed/ submitted by the Investigator(s)/Co-Investigators
  - Investigator(s) Name & Institute
  - Project Title
  - Project Status
  - Completed-duration, period (from.... to....), funding agency and total cost On-going-duration, date of start, funding agency and total cost proposed-duration, funding agency where submitted and total cost
  - Summary of the project
  - Major Results/ Highlights of the project including achievement (publications, patents etc.), for *completed projects*
  - Up-to date Technical progress report for *on-going projects*.
- 35. Any other relevant matter.

File No\*\*\_\_\_\_\_

1. Title :

2. Proposed Budget for 3 years :

2.1 Total :

2.2 Equipment : (Please give list of major/ minor equipment)

2.3 Staff (proposed research staff) :

2.4 Other Recurring costs : Consumables : TA/DA: Institutional Charges:

3. Date of receipt\*\*:

4. PI Name, Designation & Address :

5. Date of Birth :

6. Co-Investigator(s) details :

7. Date of Birth(s) :

8. Other projects with the PI/Co-PI(s) :

Sr.No.	Title	PI / Co-PI Name (s) & Institute	Cost (in rupees)	Duration	Funding Agency

<u>Cover sheet to be filled in by the Investigator</u> \*\* to be filled by SERB

#### ANNEXURE-B

#### **PROGRESS REPORT**

1. Project Title:	SERB No:
2. PI (Name & Address):	Date of Birth
3. Co-PI (Name & Address):	Date of Birth
4. Broad area of Research	
4.1 Sub Area	
5. Approved Objectives of the Proposal :	
Date of Start:	Total cost of Project:
Date of completion:	Expenditure as on:

6		
0.	Methodology :	
7.	Salient Research Achievements:	
	Salient Research Achievements: 7.1 Summary of Progress	

7.2 New (	<b>Observations:</b>
-----------	----------------------

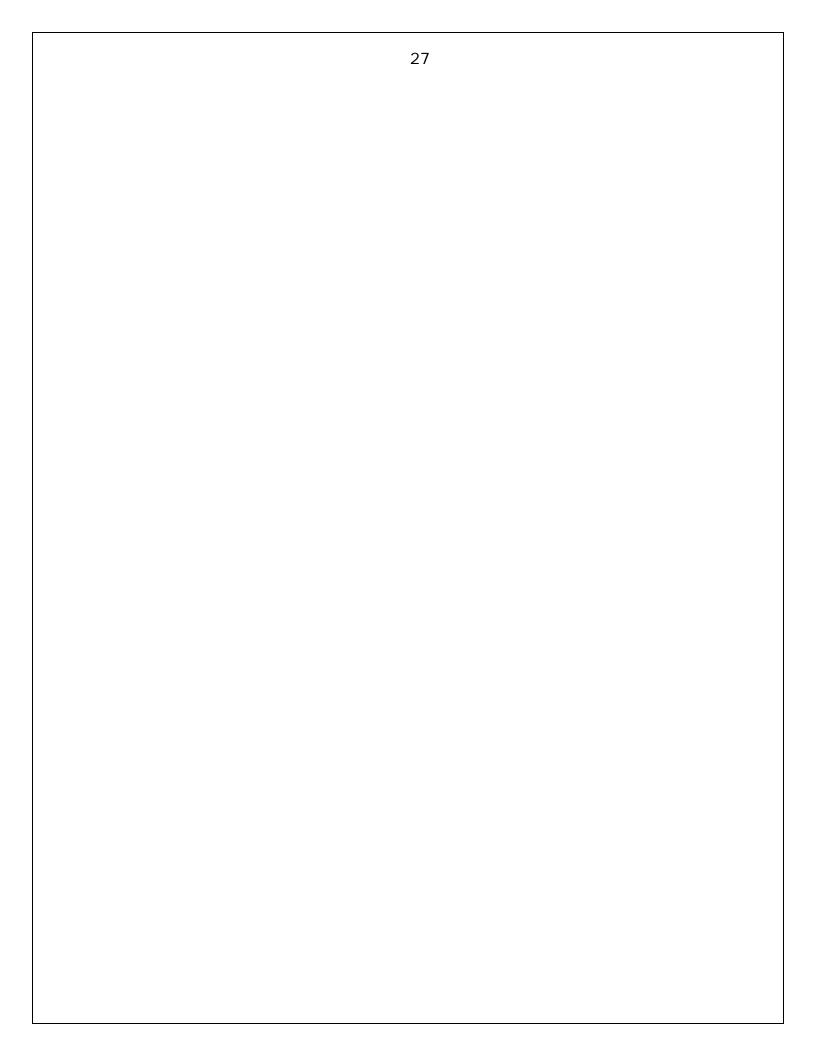
7.3 Innovations:

7.4 Application Potential: 7.4.1 Long Term

7.4.2 Immediate

7.5 Any other

8. Research work which remains to be done under the project (for on-going projects)



10. List of Publications from this Project (including title, author(s), journals & year(s) (A)Papers published only in cited Journals (SCI)         (B) Papers published in Conference Proceedings, Popular Journals etc.         11. Patents filed/ to be filed:         12. Equipment         S No       Sanctioned List         Procured       Cost         Working       Util	
<ul> <li>(A) Papers published only in cited Journals (SCI)</li> <li>(B) Papers published in Conference Proceedings, Popular Journals etc.</li> <li>11. Patents filed/ to be filed:</li> <li>12. Equipment</li> <li>S No Sanctioned List Procured Cost Working Util</li> </ul>	
(B) Papers published in Conference Proceedings, Popular Journals etc.	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
11. Patents filed/ to be filed:       12. Equipment       S No     Sanctioned List   Procured Cost Working Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
12. Equipment     S No   Sanctioned List     Procured   Cost     Working   Util	
S No Sanctioned List Procured Cost Working Util	
S No Sanctioned List Procured Cost Working Util	
S No Sanctioned List Procured Cost Working Util	
(Yes/No) (Rs in lakhs) (Yes/No) Ra	isation
	te (%)
Model & make	

Sr.	Sanctioned Head	Sanctioned	Total Released	Expenditure				
No.		Amount	Amount	(in Rs.)				
		(in Rs.)	(in Rs.)					
				1st	2nd	3rd	Total	
				Financial	Financial	Financial		
				Year	Year	Year		
1.	Equipment							
2.	JRF/SRF/RA							
3.	Consumables							
4.	TA/DA							
5.	Institutional Charges							
	Total							

# Signature of PI

Signature of Head of Institute / Organization

#### Date

Note: No column should be left blank, in such cases write Not applicable (NA) wherever applicable. Additional sheets may attach wherever needed.

#### ANNEXURE-C

#### FINAL PROJECT COMPLETION REPORT (PCR)

- <u>Notes:</u> 1. 10 copies of the Final Project Completion Report (PCR) should be sent within one month of the completion or termination of the project.
  - 2. The PCR should be in bound form.
  - 3. Cover page should include the title of the project, file number, names and addresses of the investigation.
- 1. Title of the project:
- 2. Principal Investigator(s) and Co-Investigator(s):
- **3**. Implementing Institution(s) and other collaborating Institution(s):
- 4. Date of commencement:
- 5. Planned date of completion:
- 6. Actual date of completion:
- 7. Objectives as stated in the project proposal:
- 8. Deviation made from original objectives if any, while implementing the project and reasons thereof:
- 9. Experimental work giving full details of experimental set up, methods adopted, data collected supported by necessary table, charts, diagrams & photographs:
- 10. Detailed analysis of results indicating contributions made towards increasing the state of knowledge in the subject:
- 11. Conclusions summarising the achievements and indication of scope for future work:
- 12. S&T benefits accrued:
  - i. List of Research publications

S No	Authors	Title of paper	Name of the Journal	Volume	Pages	Year

- ii. Manpower trained on the project
  - a) Research Scientists or Research Associates
  - b) No. of Ph.D. produced
  - c) Other Technical Personnel trained

- Patents taken, if any iii.
- **13**. Financial Position:

No	Financial Position/ Budget Head	Funds Sanctioned	Expenditure	% of Total cost
Ι	Salaries/ Manpower costs			
II	Equipment			
III	Consumables			
IV	Contingencies			
V	Travel			
VI	Institutional Charges			
	Total			100%

## 14. Procurement/ Usage of Equipment

a)

S No	Name of Equipment	Make/ Model	Cost (FE/ Rs)	Date of Installation	Utilisation Rate (%)	Remarks regarding maintenance/ breakdown

b) Plans for utilising the equipment facilities in future

Name and Signature with Date

a.\_\_

(Principal Investigator)

b.\_

(Co-Investigator)

Date:

Head of Institute/Organization

Note: Final project Completion Report (PCR) is expected to be self-contained complete report of the work done. Please do not leave any column unanswered.

#### ANNEXURE-D

#### PROFORMA FOR GFR 19-A (See Rule 212(1) of GFR 2005 form of Utilization Certificate).

# UTILISATION CERTIFICATE (2 COPIES) FOR THE FINANCIAL YEAR - (ENDING 31ST MARCH)

- 1. Title of the Project/ Scheme:
- 2. Name of the Institution:
- 3. Principal Investigator:
- 4. Science & Engineering Research Board (SERB) Sanction order No & date sanctioning the project:
- 5. Head of account as given in the original sanction order:

6.	Amount brought forward from the previous	i. Amount
	Financial year quoting SERB letter no and date	ii. Letter No
	in which the authority to carry forward the said	iii. Date
	amount was given	
7.	Amount received during the financial year	i. Amount
	(Please give SERB letter/order no and date) ii. I	Letter/Order No
		iii. Date
8.	Total amount that was available for expenditure	Rs.
	(excluding commitments) during the financial year	
	(Sr. No. 6+7)	
9.	Actual Expenditure (excluding commitments)	Rs.
	Incurred during the financial year (upto 31st March)	
10.	Balance amount available at the end of the financial year	ar:
	· · · · · · · · · · · · · · · · · · ·	
11.	Unspent balance refunded, if any (please give details of	cheque no etc.):
	-	_ `
12.	Amount to be carried forward to the next financial year	(if applicable):

#### UTILISATION CERTIFICATE

 1. Certified that out of Rs\_\_\_\_\_\_ of grants-in-aid sanctioned during the year

 \_\_\_\_\_\_\_ in favour of \_\_\_\_\_\_\_ vide SERB order No.

 \_\_\_\_\_\_\_ dated \_\_\_\_ and Rs \_\_\_\_\_\_ on account of unspent balance of the

 previous year, a sum of Rs \_\_\_\_\_\_\_ has been utilised for the purpose of

 \_\_\_\_\_\_\_ for which it was sanctioned and that the balance of Rs

 \_\_\_\_\_\_\_ remaining utilised at the end of the year has been surrendered to SERB (vide

 DD/Cheque no. \_\_\_\_\_\_ dated \_\_\_\_\_) will be adjusted towards the grants-in-aid

 payable during the next year i.e. \_\_\_\_\_\_.

2. Certified that I have satisfied myself that conditions on which the grant-in-aid was sanctioned have been dully fulfilled/ are being fulfilled and that I have exercised the following checks to see that the money was actually utilized for the purpose for which it was sanctioned.

Kinds of checks exercised.

1. 2.

*2*.

3.

Signature of PI	Signature of Registrar /	Accounts Officer
	Signature of Head	of the Institute
Date	Date	Date
Date	Date	Date

(Countersigned in SERB) Signature:\_\_\_\_\_ Designation:\_\_\_\_\_ Date:\_\_\_\_\_

33

#### STATEMENT OF EXPENDITURE

- 1. Sanction Order No and date:
- 2. Total Project Cost:
- 3. Revised Project Cost: (if applicable)
- 4. Date of Commencement:
- 5. Statement of Expenditure:

(month wise expenditure incurred during current financial year)

Month & year	Expenditure incurred/ committed				

#### 6. Grant received in each year:

a. 1<sup>st</sup> Year

:

- b.  $2^{nd}$  Year:
- c.  $3^{rd}$  Year:
- d. Interest, if any:
- e. Total (a+b+c+d):

#### Statement of Expenditure

# (to be submitted financial year wise ie. DOS\* to 31<sup>st</sup> March of that financial year say20XX, 01-04-20XX till

Sr No	Sanctioned Heads	Funds Allocated	Expenditure Incurred				Balance as on (date)	Requirement of Funds upto	
		(indicate sanctioned or revised	<u>1<sup>st</sup> Year</u> (DOS to to 31 <sup>st</sup> March next year)	2 <sup>nd</sup> Year (1 <sup>st</sup> April to 31 <sup>st</sup> March next year)	<u>3<sup>rd</sup> Year</u> <u>&amp; so on</u> (1 <sup>st</sup> April to 31 <sup>st</sup> March next year)	Total		31 <sup>st</sup> March next year	Remarks (if any)
Ι	II	III	IV	V	VI	$\frac{\mathbf{VII}}{(\mathbf{IV} + \mathbf{V} + \mathbf{VI})}$	VIII (III – VII)	IX	X
1.	Manpower costs								
2.	Consumables								
3.	TA / DA								
4.	Equipment								
5.	Institutional charges								
	Total								

31.03.20XX+1year and so on)

Name and Signature of Principal Investigator:

Signature of Competent financial authority: (with seal) Date:

\* DOS – Date of Start of project

Date:

Note : 1. Expenditure under the sanctioned heads, at any point of time, should not exceed funds allocated under that head, without prior approval of SERB i.e. Figures in Column (VII) should not exceed corresponding figures in Column (III)

2. Utilisation Certificate for each financial year ending 31<sup>st</sup> March has to be enclosed.

#### COST DETAILS OF PERMANENT EQUIPMENT/ ASSET

S No	Name of Equipment/ Asset with manufacturer & model name, etc. and date of	Sanctioned FE	d Amount Rs	Actual Expe	enditure* Rs	Other expenses, if any **	Utilisation Rate (%)
1.	procurement						
2.							
3.							
	Total						

\* This should include only the cost of equipment, insurance and freight charges.

\*\* Other expenses such as bank charges, agency commission etc. should be avoided through appropriate negotiations. If unavoidable expenses are incurred, the same may be indicated.

Name and Signature of Principal Investigator: Date:

> Signature of Competent financial authority: \_\_\_\_\_\_ (with seal)

> > Date:\_\_\_\_\_

#### ANNEXURE-E

#### PROFORMA FOR RULE 209 (1) OF GFR 2005

#### **UNDERTAKING**

I, \_\_\_\_\_ s/o \_\_\_\_\_ R/o\_\_\_\_(*Address*) \_\_\_\_\_, the deponent do hereby solemnly affirm and declare on oath as under: -

- 1. That the deponent is the Competent authority in the Organization.(*Name of firm and address*)\_\_\_\_\_.
- 2. That the organization has not availed any financial assistance for the same purpose or the R&D activity from the Ministry of Food Processing Industries in the past.
- 3. That the deponent do hereby affirm that the Organization will not apply/ has not applied for/ obtained any grant/ subsidy from any Ministry/ Central Government Department/ GOI organizations/ any agency of State / Central Government for the same purpose/ activity.
- 4. That all the documents, explanations/ information's etc. submitted by the organization from time to time are true, correct and complete to the best of its knowledge and belief.

Deponent

#### **Verification:**

Verified that the content of this affidavit are true and correct to the best of the knowledge and belief of the deponent and no part of this affidavit is kept concealed therein, If anything is found false in this Affidavit subsequently deponent and organization shall alone be liable jointly and severally for action under the laws, hence verified at <u>(Place)</u> on <u>(Date)</u>.

Deponent

#### ANNEXURE-F

#### **Terms and Conditions of the Grant**

- 1. I shall from time to time disclose fully to SERB the progress of any other investigations undertaken by me while in receipt of such assistance as aforesaid.
- 2. I confirm that, at any time during the course of such assistance or within a period of three years after the completion of the project, if I shall make any invention arising out of or in connection with the said Investigation, I shall hold the same in trust on behalf of MFPI and I shall forthwith disclose to MFPI.
- 3. I confirm that the Applicant organization (Private organization) accepts that the remaining expenditure will be borne by them from their budget.
- 4. Confirmation that,
  - (a) Necessary provision for housing the equipment procured out of MFPI grant and other infrastructure facilities have been created,
  - (b) These equipment (or any one equipment) will not be shifted to any other place of work/laboratory/Department for any reason, as the set is for specialized research work and,
  - (c) The University/organisation will bear the cost of maintenance and repair of the equipment procured out of MFPI grant.
- 5. I confirm that the equipment will be procured through competitive bidding directly from manufacturers or their authorized agent(s). Further, in case of private organizations/universities/institutions, they shall submit copy of purchase order for the equipment to be purchased.
- 6. The result of the project shall be shared with SERB within the stipulated time and progress report will be sent (as per standard Proforma) as and when demanded by SERB, normally once a year.
- 7. At the end of each financial year (FY) and at the time of seeking further instalment of grant, I shall submit the following documents strictly as per SERB formats:
  - a) Two copies of audited Utilization Certificate (UC) and up to date Statement of Expenditure (SE) including expenditure for the previous financial year (in original);
     as per Annexure D

- b) Technical Progress Report as mentioned above in Para 6.
- c) List of Assets acquired till that Financial Year.
- 8. I confirm that, (a) the research carried out with the financial assistance of MFPI shall be in public domain, (b) the equipment procured out of MFPI grant will be property of MFPI/GOI and may be utilized as Business/R&D Incubation Centre after the research is completed for testing / Research / Product Development etc by other Institute / organizations on payment basis.
- 9. I confirm that employing any research or other staff for the instant project does not imply any assurance or guarantee for subsequent employment by MFPI. The Ministry will not be concerned / answerable for any legal issues related to further employment / payment of salary / wages etc and it will be solely the responsibility of the University / Institution where he/she is working.
- 10. I confirm that any financial assistance for the proposed project shall not be obtained / taken from other sources (except industrial partner).
- As per the current guidelines, an affidavit/undertaking duly notarized / verified by competent authority / chief administrator of the organization in compliance with rule 209 [I] of GFR 2005, (Annexure-E) shall be submitted.
- 12. Confirmation that the proposed equipment to be procured out of MFPI fund are not already available with any division/section of the institute/ organization.
- 13. Expert Committee recommendation is subject to Administrative and Financial Approval of Competent Authority of SERB. The eligibility and pattern of assistance is that the Government organizations will be considered for financial assistance to the tune of 100% of equipment cost plus cost of consumables and expenditure related to JRF/SRF/RA and or Research / Project Assistant, specific to the project of specified duration up to three years only. No assistance will be provided for already existing equipments. Government organization will also be eligible for availing grant towards TA/DA and Institutional Charges as per the guidelines and Private organizations will be eligible for financial assistance towards the cost of equipment only to the tune of 50% in General Areas and 70% in the Difficult Areas. 100% grant will be provided for the Ministry sponsored project to (s) reputed public funded organization only in cases of cutting edge areas of research leading to development of innovative products, processes and manufacturing practices.

- 14. Undertake to refund unspent balance within 3 months of completion of project, else interest may be levied on that unspent amount as per provisions of GFR(s).
- 15. I hereby undertake to abide by the current Terms and Conditions for R&D Schemes.

Signature of P.I.

Date:

Signature of Head of Institute / Organization

#### ANNEXURE-G

#### (To be prepared on No-Judicial Stamp paper of Rs. 100/-)

#### SURETY BOND

KNOW	ALL	MEN	BY	THESE	PRESENTS	that	we,	M/s
		,	a		(Type	of	orgar	ization)
					(N			
and hav	ving its	registere	d offi	ce at				
(hereinafte	er called t	he "Obliger	s") are	held fully an	d firmly bound	to the I	President	of India
(hereinafte	er called	the "Gov	vernmen	t") for the	sum of Rs			
(Rupees					only) well an	d truly	to be pai	d to the
Governme	ent on der	nand and w	ithout a	demur for v	which payment	we firm	ly bind o	urselves
and our su	ccessors a	and assignee	es by the	se presents.				
SIGNED	on the _			da	ay of			_ in the
year Two	Thousand	••						
WHEREA	S on the	Obligers' r	equest	the Governn	nent as per Min	istry of	Food Pro	ressing
		-	-		Dated	-		-
maasares	Sunction	014011101_			Duited			
(hereinafte	er referred	to as the	"Letter	of Sanction'	) which forms	an integ	gral part	of these
					marked as Anne			
-							-	
					or the			of
					the			
					the sum of Rs			
					the Obligers (			
Obligers d	lo hereby	admit and a	cknowle	dge) on cond	lition of the Obl	igers ex	ecuting a	bond in
					e Obligers have			

NOW the conditions of the above written obligation is such that if the Obligers duly fulfill and comply with all the conditions mentioned in the letter of sanction, the above written Bond or obligation shall be void and of no effect. But otherwise, it shall remain in full force and virtue. The Obligers will abide by the terms & conditions of the grants-in-aid by the target dates, if any specified therein.

THAT the Obligers shall not divert the grants-in-aids and entrust execution of the Scheme or work concerned to another institution(s) or organization(s).

THAT the Obligers shall abide by any other conditions specified in this agreement and in the event of their failing to comply with the conditions or committing breach of the bond, the Obligers individually and jointly will be liable to refund to the President of India, the entire amount of the grants -in-aid with interest of 10% per annum thereon. If a part of the grants-in-aid is left unspent after the expiry of the period within which it is required to be spent, interest @10% per annum shall be charged upto the date of its refund to the Government, unless it is agreed to be carried over.

The Obligers agree and undertake to surrender / pay the Government the monetary value of all such pecuniary or other benefits which it may receive or derive / have received or derived through / upon unauthorized use of (such as letting out the premises on adequate or less than adequate consideration or use of the premises for any purpose other than that for which the grants-in-aid was intended of the property) buildings created / acquired constructed largely from out of the grants-in-aid sanctioned by the Government of India, Ministry of Food Processing Industries or the administrative Head of the Department concerned. As regards the monetary value aforementioned to be surrendered / paid to the Government, the decision of the Government will be final and binding on the Obligers.

AND THESE PRESENTS ALSO WITNESS THAT the decision of the Secretary to the Government of India in the Ministry of Food Processing Industries on the question whether there has been breach or violation of any of the terms or conditions mentioned in the sanction letter shall be final and binding upon the Obligers and

IN WITNESS WHEREOF these presents have been executed as under on behalf of the Obligers the day herein above written in pursuance of the Resolution No.\_\_\_\_\_ Dated

\_\_\_\_\_ passed by the governing body of the Obligers, a copy whereof is annexed hereto as Annexure-II and by \_\_\_\_\_\_ for and on behalf of the president on the date appearing below:-

Signature of the AUTHORISED SIGNATORY Signed for and on behalf of (Name of the Obliger in block letters) (Seal / Stamp of Organization)

43

1. Signature of witness

2. Signature of witness

Name & Address

\_\_\_\_\_

Name & Address

# TO BE FILLED UP BY THE SCIENCE AND ENGINEERING RESEARCH BOARD (SERB)

the applicant University/Institute/organisation must submit the quotation, detailed specification alongwith the copy of Purchase Order for the equipments to be procured out of Second instalment

(ACCEPTED)

For and on behalf of the President of India

Name:\_\_\_\_\_

Designation:	
Dated:	

Notary Seal & Signature