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ICAR

Indian Council of Agricultural Research

Guidelines for
QRT

2009

Guidelines for QRT

2009



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Foreword

The Quinquennial Review of the ICAR Institutes/Bureaux/Project Directorates/ National Research Centres as well as of the All-India Co-ordinated/Network projects, Krishi Vigyan Kendras and Trainers' Training Centres is an important time-tested mechanism for monitoring and evaluation of R&D programmes through specifically constituted Quinquennial Review Teams (QRTs), which are composed of experts from outside the ICAR system. Accordingly, the guidelines for the functioning of the QRTs are provided by the ICAR.

It was decided to review and revise the existing QRT guidelines framed in the year 2000 as a part of the overall exercise of the reform process in the ICAR. Therefore, a Committee was constituted under the Chairmanship of Dr H.K. Jain, Former Director, IARI. The Committee thoroughly reviewed the existing guidelines by considering the present system as well as the global developments, and revised the text.

The report of the Committee was then accepted after a thorough review process in the Council, including the approval of the Governing Body of the ICAR, which also suggested some modifications in the manuscript submitted by the Committee. Thus, the revised guidelines are being implemented in the current year 2009 for monitoring progress of research, its relevance and excellence, and for taking steps to fulfil mission and goals of various kinds of the ICAR Units. The revised guidelines aim to make the quinquennial review process more participatory and consultative, and will enlarge the role of QRTs to streamline different functions of each institute /unit for review.

The Council appreciates the contributions of the Committee as well as of members of the Governing Body of the ICAR, including all those who contributed to these new guidelines, and hopes that these guidelines would be more relevant to the current and emerging needs.



(Mangala Rai)

Secretary, DARE and Director-General, ICAR

New Delhi
18 May 2009

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Guidelines for QRT : 2009

1. General

The ICAR is the public sector agricultural research body at the apex level for co-ordinating, directing, funding and promoting agricultural research, education and front-line extension in the country. It is mainly funded through lump-sum grants from the Government, and is accountable to the funds received from the Government. The ICAR has at present 6 multidisciplinary national institutes (deemed-to-be-universities), 42 central research institutes, 18 national research centres (NRCs), 6 bureaux, 24 project directorates, 60 All-India Co-ordinated Research Projects (AICRPs) and 565 KVKs. The ICAR, through its network of institutions and in partnership with SAUs and other stakeholders, aims to address challenging problems of food and nutritional security, poverty and sustainable resource management. As the institutions constitute the core of the ICAR, the effectiveness of each institution is crucial for the continued success of the ICAR system.

Each institution is operating within the mandate assigned to it and the overall rules and guidelines of the ICAR; besides the other policy directives that may be received from time-to-time from the Government, and subsequently adopted by the ICAR. The institution, depending upon its mandate, is guided by the respective Deputy Director-General of the eight subject-matter divisions at the ICAR headquarters, and is assisted by a duly constituted body called Institute Management Committee. Each institution's functioning, policies and programmes are also guided by a Staff Research Committee and a Research Advisory Council. There are also bodies called Grievance Cell and Joint Staff Council to advise on the administrative and personnel matters.

The ICAR has established a tradition of Quinquennial Reviews (QRs) to provide a mechanism of transparency and accountability to the Governing Body of the ICAR. QRs are the responsibility of the ICAR, and are conducted for the institution once in every five years (each institute/unit is expected to facilitate the QRT so that the report is finalized and submitted to the competent authority one year prior to the start of the each Five-Year Plan). As each institution is functionally independent, QRs serve as an essential component of the monitoring and accountability system of the ICAR. The five-year review (achievement audit) is essential for monitoring progress of research, its relevance and excellence, and for providing guidelines to the ICAR for taking steps for the fulfillment of the mission and goals of the institutes and other units supported by it. The Quinquennial Review, like the External Programme Management Review (EPMR) under the CGIAR provides a measure of central oversight. The

purpose of the independent review is to help the Governing Body of the ICAR to assess contributions made by each one of its institute/unit, and to evaluate its constraints, potentials, strategies and plans in scientific research and management of the programme. It is thus both retrospective and prospective. The review should be viewed as a joint venture of the ICAR headquarters and the concerned institute/unit. It should be the means for each unit to share its past achievements and problems with the ICAR headquarters, and to develop strategies and plans for the future. For conducting the Quinquennial Review, the ICAR will appoint a Committee of experts with an outstanding scientist as its Chairman. The review will be conducted in accordance with the guidelines approved by the Governing Body of the ICAR. It is desirable that the Quinquennial Review should be conducted in the 4th year of the Five-Year Plan so that its recommendations become available for planning future programmes coinciding with the next five-year plan of the institution through respective SFC/EFC Memorandum, which is the administrative/financial sanction.

2. Composition of the QRT

The review should be considered as an independent external review, and its membership should be broad-based. The composition of the QRT should be restricted to 5 or 6 eminent scientists, including one management scientist/specialist and the Chairman*. In the case of deemed-to-be-universities, the number of members of the panel may be increased to a maximum of 9, and one of these members may be from the international organization or university. The QRT members should possess generally an expertise in the subject relevant to the programme/institute/unit under review with wider experience of research, education, extension, socio-economic impact analysis and management. They should satisfy the following criteria.

- The Chairman of the QRT should be an eminent scientist having specialized knowledge of the subjects and areas of research covered by the concerned institute/unit, and should possess wider knowledge and experience of such critical reviews in the ICAR or other research organizations. A scientist with broader knowledge and experience should be preferred.
- The composition of the QRT would be made through joint consultations between the Chairman of the QRT, ICAR Hqrs and the Head of the institute/unit.
- While selecting members, it should be ensured that some of them should be with experience of similar QRT work. Scientists of eminence serving within the National Agricultural Research System (NARS) will also be eligible to become the member of the QRT. One member of the team should be an economist for economic analysis of the research output as well as of the transfer of technology. It would

*Terms of references for the committee is placed at Appendix 1.

also be desirable that an expert in management is associated with the team.

- The willingness of the Chairman and the members of the QRT shall be ascertained by the ICAR Secretariat of the concerned subject-matter division. The Director of the institute/the Head of the respective unit should be requested to suggest names of the QRT members, which could be taken into consideration along with other suggestions from the ICAR Hqrs.
- Up to 50% of the members could be drawn on the basis of their broad experience in agricultural research/socio-economic research/extension or management. Specialists having broad experience in the management of multidisciplinary programmes should be given preference.
- The Director of the institute/the Head of the respective unit in consultation with the concerned DDG should identify a member as Secretary of the QRT for assisting the Chairman in work. He should be posted with the necessary authority and logistic support for the QRT work. Once the team is commissioned, the responsibility should be entrusted to the Institute/unit for providing the necessary assistance till the team submits its report. The DDG should monitor the process the interest of QRT, and ensure that all the requisites of the QRT are fulfilled.
- A single QRT would be constituted for each of the institute/unit. If the heads of the institutions also perform the functions of co-ordination of AICRPs, and also operate KVK/TTC, then the QRT constituted for the institute/unit will also review functioning of the AICRP, KVK and TTC. In such cases, one of the QRT members must be an expert in agricultural extension. Review of the range of activities being performed by the same institute should be the mandate of the QRT for the institute, as it provides insights on the efforts made and success achieved in harmonizing different functions of the institute. For review of the KVKs/TTCs, which are outside the ICAR system, eight QRTs, one for each zones, may be constituted. Based on the background information, the Team may purposively select one or two KVKs which are performing well and one or two not performing well from each of the type of organizations, viz., SAUs, NGOs and other institutions. The report of such QRT shall have application to the others in that category in each zone.
- For the All-India Co-ordinated Research Programme related to the institute operated by the Directors of the related institute, a few additional subject-matter specialists may be added to assist the QRT in carrying out a critical review. Their report should be integrated with the final comprehensive report of the QRT for the institution. This will also hold true for the ICAR institutions, which also operate KVKs and TTCs.

- In the case of large institutes such as deemed-to-be-universities, the QRT should be assisted by the specialist in an area where it needs such support as is decided by the Chairman of the QRT in consultation with the DDG.

3. Format/Structure of the QRT Report

The Quinquennial Review Team will address in its Report all the Terms of Reference (ToR) assigned to it in a comprehensive manner. The standard procedure would be to provide for each ToR a summary of the existing position, followed by the Review Team's analysis of what it considers as the strong and weak points. The recommendations which will follow will be based on its in-depth analysis. The following outline is suggested for the Review Team' Panel's Report to facilitate its processing in the ICAR.

A Introduction to the report

The brief introduction would include the constitution and composition of the Review Panel, Terms of Reference and other relevant information, including dates for the Review.

B The process

The Panel will provide a brief account of the process followed by it in the course of the Review in a chronological order. The process will start with the first meeting(s) held in the ICAR, followed by the visit to the concerned institute and presentations and discussions held there with the Director of the institute and scientists, as well as with the other staff at various levels. The interactive nature of these discussions will be highlighted. The visits to the selected regional stations of the institute and the discussions held there will also be indicated. It is through these visits, presentations and discussions over a period of four weeks (at a stretch) that the full flavour of the review process will be communicated to the readers of the Report. The discussions held with the stakeholders such as senior officials of the Departments of Agriculture and Extension, with the private sector and a representative group of farmers will form part of the process.

C Main body of the report

- Brief history:* A page about past history of the institute/unit and outstanding achievements.
- Mandate of the Institute:* India's agricultural research, education and development system continues to evolve rapidly. In this changing policy environment, the Institute may be called upon to work with a revised mandate. If the Panel feels that the mandate of the institute should be changed, it should provide its suggestions in this regard. A draft of the revised mandate may be suggested.
- Priorities, programmes and projects:* A comprehensive review of these will constitute the main body of the Report. The procedure as indicated in the three-part process—the present position, in-depth analysis and recommendations may be followed. The analysis part should

offer an opportunity to draw attention to the significant achievements of the institute during the past five years and to some of its failures. The achievements should be in terms of the impact of the institute's work in the form of development and dissemination of improved and new production technologies evolved by the institute, their expression on farmers' fields in the form of area covered, increased productivity and production, increase in the income of farmers, and any other socio-economic benefits. A number of methods are now available for analyzing economic impact of the technologies released to farmers and to the agri-business sector. The impact will also be seen in the form of strategic and basic researches carried out by the scientists, and the papers published in the reputed scientific journals. The papers published in the high impact journals should be highlighted. The reaction of the stakeholders may be included. The Panel may also like to comment on the balance between basic, strategic and applied researches. Research carried out by Ph.D students and Post-Doctoral Fellows, wherever applicable, may receive attention. It may take into consideration the services rendered such as training, demonstration, education, exchange of research material, etc.

- *Structure and organization:* The mandate, the research priorities, programmes and projects of an institute would normally determine its organizational structure, which should facilitate effective and efficient conduct of research. A pre-conceived structure cannot be imposed on an institute. The Panel will offer its observations on the appropriateness of the existing organization and structure of the Institute following its analysis, and make recommendations for change, if considered necessary.
- *Management practices:* The ICAR has laid down certain norms for allocation of funds to different projects. Good management implies a reasonable balance in the allocation of funds to salary costs of the scientists, supporting staff, administrative staff and for the conduct of research itself including equipment, chemicals and other consumable and non-consumable items. Maintenance cost constitutes another discrete part of the budget. The Panel may give its analysis with regard to this kind of balance with regard to different kinds of costs in the institute and make recommendations. Issues like delegation and decentralization of responsibility by the Director to scientists and other staff, management and maintenance of farm and laboratory infrastructure, upgrading of equipment, implementation of O&M reforms, as introduced by the Council, review of the recommendations made by the Management Advisory Committee and the Research Advisory Committee and action taken on them by the institute may also be examined.
- *Collaboration with SAUs and other research institutions:* India has a large network of ICAR research institutes, and national centres, state agricultural universities, research institutions outside the ICAR system

and R&D units in the private sector. As research becomes advanced and inter-disciplinary in nature, further progress will be through increasing collaboration between different research centres. The Panel is expected to consider and comment on the institute's collaboration with these and suggest ways to strengthen it.

- *Linkages with clients/end-users:* In the absence of a fully reorganized extension service, more relevant to the current needs of the farmers, the institute's linkages with the farming community, agri-business companies and NGOs have become particularly important. Training programmes for stakeholders both in the public sector and the private sector should be reviewed. So should also the publication programme in the form of extension bulletins and other forms of communications. The front-line demonstrations and collaboration with the KVKs should receive special attention. The yield gap analysis carried out by the institute may be observed, and institute's proactive role in narrowing the yield gap may be highlighted.
- *Human, physical and financial resources:* The ICAR provides adequate resources to all its institutes. The Panel is expected to comment on the availability and efficient use of these resources. In particular, the human development programmes of the institute should be reviewed and suggestions be made for formulation of a staff development plan, identifying key areas of research that require strengthening. The discipline required in the management of financial resources should receive attention.
- *Planning for the future:* In the fast changing world of science and technology, and as Indian agriculture faces new challenges, every institute is called upon to have a clear vision for its future and prepare itself for the new challenges and opportunities. The documents prepared by the institute in this regard may be reviewed.

D Overall assessment

The Panel may provide its rating of the performance of the institute as outstanding, very good, good and average. In addition to giving rating to the institution, the QRT should specify, in short, the reasons on which the rating is based. More important, the Panel may list the measures which it considers necessary for a more effective and efficient functioning of the institute/unit. These measures, if the Panel feels strongly, may call for a major reorganization of the institute/unit.

E Consolidated recommendations

F List of annexures

4. Terms of Reference

The terms of the reference of the QRT would be as given in Annexure 1.

5. Financial Guidelines

The following financial guidelines are suggested for the QRT.

- A suitable provision for QRT expenditure should be made in the plan budget under the EFC/SFC of the institute/unit during each Plan.
- Good transport facilities should be provided for the QRT work by the institute. The institutes/ZCUs/AICRPs concerned should arrange proper stay and journey arrangements for the members on payment basis as per rules. Efforts should also be made that all the members should stay at one place so as to create an environment for maximum interaction and discussion.
- The honorarium for the members will be Rs 1,000 per day subject to the limit of Rs 15,000 over a period of six months in addition to normal TA/DA as admissible under the ICAR rules. Employees of SAUs, ICAR institutions and Government serving on the QRTs should also be paid honorarium, but should take leave of the kind due for the QRT work.
- The expenses incurred in connection with the QRT review would be debited to the concerned institute/programme/ZCU and met out of the Plan budget provided for this purpose.

6. Time Schedule and Programme

The process of organizing the QRT must be started by the ICAR at least 3 months in advance from the actual review by constituting QRT, its Chairman, setting timing of review and its duration in consultation with the institute/unit (Annexure II). The copy of the order constituting QRT should be sent to the ADG (PIM) for records and need-based referencing. The concerned DDG will propose a panel of 3 outstanding scientists who can be selected as Chairman of QRT to DG, and the DG will approve one of them. After obtaining the consent from the Chairman, the DDG will convene a meeting of the Chairman and the concerned ADG and Director to identify a team as well as the Secretary as per the guidelines and propose it to DG for approval. After the constitution of the QRT and taking consent of the members, the ICAR should arrange a preliminary planning meeting. Within a period of 2 months, the head of the respective institute/unit shall prepare a document as per the guidelines given in Annexure III. Copies of this document would be sent to the concerned ADG at the ICAR Headquarters, Chairman and members of the QRT well in advance of the date of preliminary planning meeting. Along with this document, the QRT should be supplied with the following reports by the Director of the concerned institute.

- Annual reports of the institute/unit for the period under review (Most recent and five years' earlier reports must be included) along with a list of publications made during the period, and reprints of important papers, both scientific and popular.
- List of important scientific papers published in impact making journals or presented in seminars/symposia held during the period under review along with copies of the selected papers/strategic research

undertaken/technologies developed, commercialization, patented technologies having measurable impact of the technologies and outcome.

- List of the on-going and completed projects.
- Perspective strategic plan of the institute/unit
- Status and impact of O&M reforms introduced during the period under review and plans for new initiatives in the next 5 years.
- A copy of the previous QRT review report along with action taken report. Chairman and members of the QRT would meet at the ICAR Hqrs (planning meeting), before the actual review, and with DDG/ADG and Director/Project Director of the institute/unit concerned to plan the final programme of review and visits. In this meeting, the concerned DDG will apprise of the Chairman about the rules and bye-laws of the ICAR, resource position about the institute and Council's expectations from the QRT. The concerned ADG will present the draft analysis of the documents supplied by the Director identifying issues and programmes and activities for the consideration of the QRT. The Chairman in consultation with the members will prepare a workplan of review, consultation, meetings, visits, writing and finalization of the report to ensure that the report is submitted within the stipulated timeframe. The visit of the QRT to the field stations of the institute/unit should be very selective and need-based. It may also be noted that the visit may be undertaken by a selected representative group of 2-3 members from the QRT. This meeting would be followed by the schedule of actual reviews for about 60 days, including visits, discussions and report-writing.

7. Procedure

The work requires considerable consultation with the Institute Director and the ICAR Hqrs in respect of composition of QRT, its terms of reference, timing of review and the arrangements for review. In addition, it is necessary to prepare tour programme of QRT visits to field and sub-stations. There are also following items that require preliminary consultation, as these cannot be attended to satisfactorily during the short-time available to the QRT.

- Various documents prepared by the institute/unit as indicated earlier.
- Preliminary draft analysis of these documents by the ICAR Hqrs identifying issues and programmes for consideration of the QRT.
- Discussion on the draft analysis at the planning meeting at the ICAR Hqrs by the Chairman of the QRT and Institute Director and Deputy Director-General.
- QRT may discuss with various scientists, review on-going programmes, the administrative and other technical matters at the Hqrs of the institute/unit. The QRT should visit only selected centres of the institute/unit. The head of the respective units will issue clear instruction to his staff for extending fullest co-operation to the review

team and provide information as needed. He should inform them about the scope, purpose and focus of the review.

- For the smooth conduct of the review, the QRT would be assisted by the Director of the Institute/Project Director/Director of Extension of SAUs in case of KVKs which are under SAUs and ZCs in case of KVKs which are outside ICAR/SAU system. The Chairman of the Committee will co-ordinate the work of the team and assign responsibility for preparing the QRT report. He will prepare at the beginning of the QRT work an outline of the report and an indication of the tasks earmarked for the Committee members. General format for the report is given above at item 3C.
- The draft report should be agreed upon by the QRT on or before the last day of the visit to the institute.
- During the course of the review, the Director of Institute/Head of the respective unit may be briefed by the QRT Chairman on major recommendations which the Committee proposes to make.
- On the last day of the review, the Chairman will have an interactive meeting with the Institute Management Committee to be convened by the Director of the institute/head of respective unit under review, before finalization of the Report.

8. Finalization of the QRT Report

- The QRT report may be restricted to a maximum of 100 pages.
- The Chairman would submit the QRT report to the DG after discussing and finalizing it with the members of the review team.

9. Processing of the QRT Report

Subsequently, the report will be processed in the ICAR by the concerned ADG. A copy of the Report will be sent to the concerned Director for comments. On the basis of comments of the concerned Director along with the analysis of the financial and policy implications, the ADG will prepare a note on the Council's comments on each one of the recommendations. The note will be submitted to DG through concerned DDG, and if the DG approves, the scientific recommendations along with the comments of the Council will be submitted to Governing Body (GB) for consideration and approval. The re-recommendations that involve policy directions will be dealt separately on the file and after proper vetting by the section/division concerned should be brought to GB as a separate agenda item for its approval. The recommendations after approval will be sent to the concerned Director for implementation. The concerned ADG will monitor follow-up on the implementation of the recommendations. A copy of the final approved report will be sent to ADG (PIM) for records and need-based referencing. The whole period of processing the QRT report at the ICAR (Headquarters) should be completed within 2-3 months. The concerned ADG should ensure that the processing is completed within the stipulated time.

Terms of Reference to Quinquennial Review Team

Basically, the idea is to examine whether the research and development programmes are in conformity with the priorities of the ICAR and the nation.

A. institute/unit

(i) Research achievements and impact

- To critically examine and identify research achievements of the Institutes, Projects/KVKs, and their Regional Stations and Sub-Stations, AICRPs operated by them vis-à-vis sectoral programmes since the previous QR and critically evaluate them. Commensurate with the objectives, mandates and resources of the organization, the socio-economic impact of research on farmers/beneficiaries, and transferability of results to farmers through extension should be critically reviewed.
- The research and its impact should be brought out in quantifiable benchmarks wherever possible.
- To know the value for money, QRT should assess and bring out the physical outputs and outcomes vis-à-vis the budget spent during the period under report. If the likely outcomes are going to take considerable time, the projected outcomes should be indicated.
- The socio-economic impact of research on farmers/beneficiaries and transferability of results to farmers being an important aspect of research outcome the transferability should be mandatory for major research projects.

(ii) Research relevance and budget allocation

To examine objectives, scope and relevance of the research programmes and budget of the institute for the next 5 years in relation to overall state/regional/national plans, policies and long- and short-term priorities and also the Perspective Plan and Vision 2020 documents.

(iii) Relationship/collaboration with SAUs and other stakeholders

To pinpoint whether the research programmes of the past and proposal for future are in harmony with the Vision of the ICAR (Hq) and the programme of the related centres of research and agricultural universities, state government, private sector and IARCs.

(iv) Linkages with clients/end-users

To examine the kind of linkages established with the clients and end-users of the research results, i.e. farmers/fishermen and the extent of interest displayed in conducting “on-farm research”, on farmers’ fields and in organizing demonstrations/training courses for the transfer of technology to extension agencies and KVKs of the ICAR.

(v) Proposed changes in organization, programmes and budget

To examine whether any changes in the organizational set-up are called for manpower and funds allocation. The decentralization in day-to-day working and the transparency should be highlighted. Further, the Committee may also examine the resource generation efforts and implementation of Project-based Budgeting.

(vi) Constraints

To examine constraints hindering the institute in achieving its objectives and implementation of its programme and goals, and to recommend ways and means of minimizing or eliminating them.

(vii) Looking forward

To look into any other point considered relevant by the Committee or referred to it by the ICAR, the Institute Director or the Management Committee, in respect of future programme development, research prioritization and management changes.

B. All-India Co-ordinated Research Projects (AICRPs)

1. To analyze growth of manpower, number of co-operating centres, both in terms of funds as well as staff resources.
2. To critically examine and evaluate achievements of the AICRPs in research with reference to (i) focus on national programmes; (ii) multilocation testing; (iii) evaluation of pests and diseases; (iv) exchange of scientific information; (v) inter-institutional and interdisciplinary linkages; (vi) development of strategic plans; (vii) linkages with international programmes; (viii) information on technology base; (ix) encouragement and guidance by the PC; (x) off-season nursery facilities, (xi) healthy competition in Annual Workshops and professional challenge; (xii) quality of recommendations of the Annual Workshops (group meetings) and follow-up on those recommendations; (xiii) whether research is of routine nature on trodden path or they are breaking new grounds; (xiv) whether there is individual initiative; (xv) whether there is too much of regimentation/rigidity; and (xvi) whether the resources including manpower are optimally utilized.

Budget

3. To examine sufficiency of the Budget of the Co-ordinating Centre as a part of the total budget of the SAU and of the ICAR.

Organization and Management

4. Integration of research – whether the work being carried out under the co-ordinating project derives full support from other related programmes, including basic and strategic researches.
5. What is the monitoring mechanism of the co-ordinated project in the co-operating centres to avoid distortions/duplication/overlapping in programmes of the AICRP and the SAU, including those at the regional stations?

6. Whether a strategic plan for the respective crop, commodity or natural resource with major emphasis on sustainability of production system developed by the co-ordinating unit in close collaboration with the co-operating centres?
7. How much operating funds does each scientist get under co-ordinated projects? Is it at least Rs 60,000 per scientist per year?
8. Whether the PC is located in the ICAR institute or the SAU? Whether institute scientists working in co-ordinated projects form the cadre strength of the institute, and their work forms the priority work of the institute? Do they get additional fund for the travel for the work of co-ordinated project?

Annual Workshops (Group Meetings)

9. How the Annual Workshop is organized? Is it serving as a focus of generation of new ideas? Do the senior officials from the Departments of Agriculture and Extension attend workshops? Do scientists from private sector participate?
10. Is a policy brief prepared after the workshop for use by policy-makers and planners? If so, what has been the outcome? Does the co-ordinating unit maintains an extensive database on the crop/commodity/natural resource?
11. How is the HRD programme organized for the young scientists working in the project and also other staff working in the project?

C. KVKs/TTCs

1. To examine the mandate and functioning of KVKs/TTCs in the light of the prevailing agro-climatic and socio-economic conditions of its location.
2. To assess the performance of the KVKs/TTCs against assigned task and responsibilities based on the information furnished by the KVK/TTC and the field visits.
3. To examine whether any changes in the organizational structure, staffing pattern, funding level and norms are called for to achieve an improved and effective working.
4. To undertake critical review of the research-extension linkages at the district, block and panchayat level and suggest remedial measures for focusing extension services for women farmers and agricultural development projects.
5. To obtain and analyze responses from the beneficiaries about the impact of the KVKs on agricultural production, productivity and socio-economic upliftment of the identified areas/sections under the KVK.
6. To obtain and analyze the responses from the KVKs about the impact of the TTCs in terms of providing latest knowledge and skills in subject matter areas and training methodology.
7. To examine problems/constraints, if any, requiring policy decisions, legal, institutional or administrative actions of the KVKs/TTCs.

Time Schedule

Time Period	Activities
Month 1	DDG proposes a panel of 3 outstanding scientists, and DG approves, and DDG obtains the consent of the Chairman.
Month 2	Preliminary meeting of the DDG, ADG, Director with Chairman for identifying members, Member-Secretary, and proposing it to DG for approval, and then obtain consent of all the members.
Month 1 & 2	Preparation of an institutional background document by the concerned Director and submission to DDG along with a set of relevant reports/documents.
Month 3	Preparation of an issue/programme/activities for QRT paper by the ADG/DDG/ICAR (HQ) based on the analysis of reports/documents received from Director.
Month 3 & 4	Meeting with the DDG, ADG, Chairman of QRT and presentation of the analysis by ADG, brief by the DDG on general issues, finalization of work programme/visits etc.
Month 5 & 6	Actual review and submission of the Report. Visit to Division/programmes/scientists etc. as full team or in groups. Visits to outstations (if any) in smaller groups (if necessary). Whole QRT meets, discusses and prepares draft report. The Chairman will have an interactive meeting with the Institute Management Committee to be convened by Director of the institute under review. The final report thereafter will be submitted to the DG, ICAR.
Month 7 & 8	Processing of the Report by concerned ADG in the ICAR. Preparation of a note on the Council's comments and recommendations.
Month 9 & 10	Submission of the note and taking approval of the DDG/DG/GB on the technical recommendations. The recommendations that involve policy directions will be dealt separately on file, after vetting by the section/division, will be brought to GB as a separate agenda item after approval by the Chairman, GB.
Month 11	Recommendations to the concerned Director for implementation.

Background Information to be Provided to QRT

A. Institutes/NRCs/PDs/Bureaux/AICRPs

1. Historical Background.
2. Mandate and objectives of the Institute/Project Directorate/NRC/Bureau/AICRP
3. Organization and structure: An Organogram be given along with the scientific, technical and supporting staff in the various Divisions including the qualifications of the scientific staff. This information needs to be provided in relation to the staff ratio suggested by the Council.
4. Previous QRT report and action taken on its recommendations along with implementation report. A copy of the previous report may be appended with action taken on the recommendations on the basis of the approval by the Governing Body of the ICAR.
5. Research programmes of the institutes for the period under review (year-wise), ongoing and as envisaged in the perspective plan. This information may be given Division/programme-wise.
6. Major achievements of research; division-wise and in a summarized form for the whole institute or programme.
7. Production, process, technologies developed by the institute with credited scientists.
8. Infrastructure and physical facilities planned and developed during the period under review commensurate with the mandate.
9. Human resource development efforts for different categories of staff.
10. Budget and Finance : Allocations to various heads be given along with the details and budget for the years covering the review period along with the status report on resource generation and project-based budgeting implementation.
11. SWOT Analysis of the Institute/Project.

Management

12. Frequency of meetings of the Management Committee and highlights of important recommendations and their implementation.
13. Staff Research Committees and RACs recommendations and action taken on their recommendations.
14. A report on the status of various O&M reforms.

Staff Amenities

15. Facilities available for staff including housing in campus, travel office, education facilities for children, etc.
16. Participation of scientific staff in National and International Conferences (give details and problems and suggestions for the future).
17. Sports, recreational research and vocational health facilities to the staff.

Linkage

18. Collaboration with others
 - a. Local institutions in the area, (educational, research and infrastructural facilities)
 - b. National institutes and agricultural universities
 - c. International institutions
 - d. Extension and development agencies

Research-Extension linkages. Comment on the usefulness of extension activities and such collaboration and suggestions for further improvement.

B. KVKs/TTCs

1. Name and Location of KVKs
2. Name of Scientist Incharge with Postal address and Telephone No.
3. Name of District and State Hqrs.
4. Sanction order No. and date
5. Date of Establishment
6. Name and Address of the host Instt. (SAU based/ICAR instt. based/ NGO based/Independently located)
7. Mandate and functions of KVK/TTC
8. Infrastructural facilities available (land, buildings and equipments, etc.)
9. Staff Position (based on sanctioned strength) and their mobility

Sl No	Designation	No. of sanctioned posts	Name of Persons	Pay Scale	Date of Joining	Date of Leaving
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10. Allocation under various Heads

Budget Head	Preceding Plan	I Year	II Year	III Year	IV Year	V Year
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11. Major activities undertaken
12. Major accomplishments and impact : based on Annexure IV to XI
13. SWOT (Strengths, Weaknesses, Opportunities and Threats) Analysis of KVK/TTC
14. Efforts and achievements made in the last five years towards upgradation of knowledge and skills of staff of KVK i.e. Human Resource Development (Training of Staff in Trainers' Training Centres, and other institutes etc.)
15. Give a brief account of technical back-up the KVK has been getting from ICAR Instts. and SAU scientists in programme planning, execution of programmes and evaluation
16. Enlist the publications made during the last five years. Also indicate the circulation status of such publications and the benefits accrued from them

Status of Institutional Training

Sl	Item	Indicators
A. Planning		
1.	Scheduling of training programmes	Was it done well in advance with due planning?
2.	Job analysis of the participants	Were participants asked as to what they are doing and what their duties are?
3.	Trainees' analysis	Was the knowledge test of trainees conducted before the commencement of the course?
4.	Training needs assessment	Based on the trainees and job analysis, were the training needs assessed?
B. Preparation		
5.	Organization of content (course content and syllabus)	Were the course content and the syllabus prepared and the speakers/trainers identified?
6.	Lesson plan	Was it prepared and adhered to? Has it been discussed and approved?
C. Implementation of training		
7.	Conduct of training	Were audio-visual aids used in the conduct of training?
8.	Mid-review	Was mid-review done for any modification?
D. Training evaluation		
9.	Job improvement plan	Was job improvement plan for trainees devised?
10.	Review and revision of training	Were training programmes revised based on the post-training feedback?
11.	Monitoring and evaluation syllabus (Post-training contact)	Has any mechanism/methodology developed for post-training contact with trainees. If so, how it is made use of?

Details of Training Programmes Conducted

Training programme conducted vs targets fixed (discipline-wise) for extension functionaries (last 5 years)

Sl No.	Discipline	I	II	III	IV	V	Total
		C P	C P	C P	C P	C P	C P
1.	Crop Production						
2.	Horticulture						
3.	Livestock						
4.	Fisheries						
5.	Home Science						
6.	Agril Engg						
7.	Agroforestry						
Total							

Training programme conducted for farmers/farm women (last 5 years)

Sl No.	Discipline	I	II	III	IV	V	Total
		C P	C P	C P	C P	C P	C P
Total							

Note: C, No. of Courses; P, No. of participants

Front-line demonstrations in *rabi* season

Condition: Rainfed/Irrigated

Sl. No.	Crop	Variety	No. of Farmers	Area (hectares)	Average yield	Local check Av CR	Improved variety CR	Increase CR	Net loss (Rs)	Effective gain (Rs)
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18

Front-line demonstrations in *kharif* season

Condition: Rainfed/Irrigated

Sl. No.	Crop	Variety	No of farmers	Area (hectares)	Average yield	Local check Av C R	Improved variety C R	Increase C R	Net loss (Rs)	Effective gain (Rs)
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Notes : C = Cost (Rs)/ha; R = Returns (Rs)/ha; The results of front-line demonstrations may be indicated year-wise. If livestock and other enterprises are involved, they have to be indicated and the Table modified accordingly.

Broad-basing of Front-line Extension (last 5 years)

(Numbers)

SI No.	Item	I Year	II Year	III Year	IV Year	V Year	Total
1.	Artificial insemination cases						
2.	Animal health-care provided						
3.	Poultry introduced						
4.	Piggery / rabbitary introduced						
5.	Planting material produced and distributed						
6.	Fodder and grass introduced (ha)						
7.	Trees introduced (No.)						
8.	Wasteland development plan prepared						
9.	Watershed development						
10.	Consultancy on soil analysis and topographic survey						
11.	Consultancy on land-use planning and cropping patterns						
12.	Improved hand tools and implements introduced						
13.	Fishery demonstrations						
14.	Any other						

Impact of KVK in Terms of Agricultural and Animal Productivity, Socio-economic Conditions and Employment Generation during the QRT period in the Adopted Villages

Sl No.	Item	Unit	Prior to KVK (Just prior to this QRT period)	Post KVK activities (Just after this QRT period)
1.	Change in cropping pattern	(%)		
2.	Change in productivity of			
	(a) cereal crops	(kg/ha)		
	(b) pulses			
	(c) oilseeds			
	(d) overall			
3.	Use of HYV (high-yielding varieties)	(%)		
4.	Use of fertilizers (NPK) (nutrient)	(kg/ha)		
5.	Use of FYM and other biofertilizers	(kg/ha)		
6.	Tractor/machinery	(No.)		
7.	Change in economic indicators (in adopted villages)	(No.)		
	a. Net returns/ha/yr			
	(by crop/enterprise)	Rs		

**Extension Activities Undertaken
(Last 5 years) (Numbers)**

Sl No.	Activity	I Year	II Year	III Year	IV Year	V Year	Total
1.	Field Days						
2.	Agril. Exhibition						
3.	Farmers' Fairs						
4.	Radio Talk						
5.	TV show						
6.	Film show						
7.	Training materials produced						
	(a) Pamphlets						
	(b) Video-cassette						
	(c) Slides						
8.	Farm Science Club organized						
9.	<i>Mahila Mandals</i> organized						
10.	Extension Training meetings organized						
11.	Any other						

Status of Research – Extension Linkages at the District Level

- What kind of mechanism exists for local co-ordination of the front-line extension demonstration between the KVKs and the State Govt.
- What is the frequency of Local Management Committee/Scientists Advisory Committee Meeting for KVK/TTC during the last 5 years.
- No. of monthly workshops organized
- Frequency and no. of staff participated in seminars at zonal, state and national levels.
- Whether the local NGOs are involved in KVKs/TTCs Programmes
- Whether the local *Mahila Mandal* or Farm Science clubs are promoted and have become visible in their activities.
- A brief about the extent of contribution of the officials of various line-departments and joint programmes undertaken.

Impact of KVK on Farming Populaton

(Questions given below may be administered to selected five farmers from the adopted villages and another five from non-adopted villages and appended with the report)

<ol style="list-style-type: none"> 1. Name and address of farmers 2. Enterprises being practised 3. Enlist improved technologies being adopted under different enterprises at SI No. 2 above 4. When were these improved technologies received by you, and from where? 5. Enlist 10 latest technologies which have been received from the KVK in your village and furnish information on the following. 																							
<table border="0" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left; width: 45%;">SI No. Name of technology</th> <th style="text-align: center; width: 15%;">Extent of adoption in % (approx)</th> <th style="text-align: left; width: 40%;">Reasons for formal adoption</th> </tr> </thead> <tbody> <tr> <td style="vertical-align: top;">6. What should be the approach of KVK for training and better adoption of technologies in light of your experience at SI No. 5.</td> <td></td> <td></td> </tr> <tr> <td style="vertical-align: top;">7. Do you know the activities of KVK?</td> <td></td> <td></td> </tr> <tr> <td style="vertical-align: top;">8. If yes, what are those activities?</td> <td></td> <td></td> </tr> <tr> <td style="vertical-align: top;">9. Do you think that roles/ activities of KVK need some change? Yes/No</td> <td></td> <td></td> </tr> <tr> <td style="vertical-align: top;">10. If yes, what are your suggestions?</td> <td></td> <td></td> </tr> <tr> <td style="vertical-align: top;">11. Any other comments on the KVK</td> <td></td> <td></td> </tr> </tbody> </table>	SI No. Name of technology	Extent of adoption in % (approx)	Reasons for formal adoption	6. What should be the approach of KVK for training and better adoption of technologies in light of your experience at SI No. 5.			7. Do you know the activities of KVK?			8. If yes, what are those activities?			9. Do you think that roles/ activities of KVK need some change? Yes/No			10. If yes, what are your suggestions?			11. Any other comments on the KVK				
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Terms of Reference for Dr H.K. Jain Committee

- i. To conceptualize and evolve qualitative aspects of research
- ii. To develop a framework for incorporating qualitative aspects in the research projects in the ICAR system.
- iii. To develop parameters for evaluation of the relevance and qualitative aspects of research in the QRT reports.
- iv. To develop parameters for assessing qualitative and quantitative attributes in the QRT reports on the basis of score card.
- v. To develop parameters for evaluating the extent of utilization of research output by the end-users.
- vi. To measure development outcomes for the QRT reports.
- vii. To provide feedback on the outcomes of the research programmes.
- viii. To bring out intermediate outputs and final outcomes of the investments made in quantifiable terms and the measures taken to ensure better value for money spent on research.
- ix. Any other item which the Committee feels important for improving the relevance of qualitative and quantitative aspects of the QRT reports.

Notes