



## **UPDATE OF THE GUIDELINES FOR PEER REVIEWS AT IARC**

1. The periodic in-depth review of the activities of the IARC research Sections and Groups by an independent group of experts is a central element in the evaluation of the quality of the research produced by IARC but also of the future plans and their integration within the Agency's scientific strategy and programme.
2. A formal Scientific Review programme involving the detailed scientific assessment of each research unit has been implemented at IARC since 2005 (see Resolution GC/47/R10). In its current form each research Group/Section is evaluated on a five-year cycle by an independent Review Panel consisting of members of the Scientific Council and external experts. The results of the review are presented to and discussed by the Scientific Council and reported to the Governing Council by the Director and by the Chair of the Scientific Council.
3. In May 2009 the Governing Council approved a revised detailed guidance on the Scientific Review process and on reporting by the Review Panel (see document GC/50/9 and Resolution GC/50/R16), authorizing the Chairperson of the Governing Council to approve future minor changes as proposed by the Chairperson of the Scientific Council in light of experience in reviews. Minor amendments were made in the Scientific Review Guidelines in 2013 to take into account changes in IARC's organizational structure and to introduce a revised, broader scoring system allowing greater granularity in the evaluation of scientific quality (see document [GC/55/4 Add.1](#) and Resolution [GC/55/R7](#)).
4. The current Scientific Review Guidelines provide a good framework for the evaluation of the scientific outputs of IARC's research Groups/Sections, however they were found not to offer sufficient guidance on assessing some of the broader impact of their activities, in areas such as promoting research collaborations and development of research capacity, which are central to IARC's mandate and mission. This broader scope of the research evaluation at IARC is partly captured in Resolution GC/55/R7 which states:  
*"In selecting a score the reviewers should take account of the role of IARC's research in the context of its mission, including conducting work in low- and middle-income countries and research which is difficult for national institutes or centres to perform."*
5. In order to address this gap the Secretariat prepared an updated version of the Scientific Review Guidelines including additional evaluation parameters such as contribution to the creation of collaborative networks, contribution to training and impact on public health policy which should be consistently taken into account in the peer review evaluations.
6. In January 2016, the Scientific Council reviewed and discussed the updated Guidelines for IARC Scientific Review Process (see below as well as Annexes 1–2) and recommended that the Governing Council approve the suggested changes at its next session in May 2016.

## **Guidelines for IARC Scientific Review Process (reviewed by the Scientific Council in 2016)**

As a preamble to this document, it should be noted that it uses terminology regarding the scientific structure of IARC that is intended to be as general as possible, so as to accommodate possible future changes in structure and nomenclature.

- Section:* either comprises a single integrated research grouping or a number of research Groups working on complementary areas, which require review by a single review team. There is a Section Head, with overall responsibility and there may be a Deputy Section Head.
- Group:* comprises a number of researchers working on closely related topics in the same general scientific area led by a Group Head.
- Head:* Senior Scientist holding a role of Section Head, Deputy Section Head, or Group Head.
- Review Panel:* this is the group which will carry out periodic peer reviews of scientific Sections on behalf of the Scientific Council and comprised of both Scientific Council and external expert members. Review panels will consider the Section, where this is an integrated grouping, and, in cases where Sections have constituent Groups, will evaluate the individual Groups as well as the overall Section.

### **IARC Scientific Review process**

#### **A. Aims**

1. Independent scientific review is essential to ensure the highest quality of research conducted by IARC.
2. The relevance of any research activity must be seen within the overall strategy for IARC as determined in the Medium-Term Strategy, approved by the Governing Council.
3. In order to ensure the highest quality of research, IARC will seek independent peer review conducted according to the highest international standards. The review process will involve a site visit by an expert Review Panel to assess both the past and proposed future work of the Sections and their composite Groups. A full report of the review will be prepared, which will include a Consensus Statement prepared by the Review Panel. Where deemed necessary by the Review Panel, additional reviews could be conducted between Section reviews.
4. Members of the IARC Scientific Council should play a key role in such Review Panels. However, these should be complemented by scientists of international repute from outside the Scientific Council.

## **B. Objectives**

5. The objective is to conduct a detailed scientific review of the Sections and Groups, based on past achievements and future plans. The Review will evaluate the quality and scientific merit of the work and how well it fits with the overall mission and strategy of IARC. The Review will provide advice to the IARC Director on strategy for future research in the area covered by the Section. These reviews also provide the opportunity for senior scientific staff to reassess their own research aims and directions.

## **C. Selection of the Review Panel**

6. Review Panels meet in the two days immediately preceding the Scientific Council session to which they are reporting.

7. Guidelines for selection of the Review Panel:

- a. A Chairperson for each Review will be nominated by the IARC Scientific Council at their meeting prior to the Review taking place. The Chairperson, except for exceptional circumstances, should be a current member of the Scientific Council and should be independent of the IARC scientific programme.
- b. The Review Panel should be comprised of approximately equal numbers of appropriately qualified members of the Scientific Council and non-members expert in the areas being reviewed.
- c. Members of such Review Panels should be scientists who have experience in the relevant research area, have outstanding research credentials and no conflicts of interest with the programmes being reviewed. Restricted involvement in IARC work is permissible but should always be declared in advance by inclusion in the WHO Declaration of Interest form.
- d. As each research Group will be reviewed in detail by at least two members of the Panel the Review Panel should be of sufficient size to allow for this.
- e. The process of identifying and inviting members of the Review Panel should occur as soon as possible after the Chairperson has been identified.
- f. Reviewers will be selected jointly by the Chair of the Review Panel, the Chair of the Scientific Council and the Director.
- g. After the Scientific Council meeting, the Director, in consultation with the Section and Group Heads, should provide the Chair of the Review Panel with several alternative names of potential reviewers, with short CVs/publication lists, to cover each field of research (considering the expertise of both Scientific Council members and external members).
- h. The Chair of the Review Panel, the Chair of the Scientific Council and the Director will discuss the potential external experts in one or more conference calls. The Director and the Section Head may object to any proposed reviewer on the grounds of conflict of interest, providing the objections and justification to the Review Panel Chair.

- i. Invitations to reviewers should be sent, and acceptance received, at least six months before the date of the Review. Conference calls should be used to identify alternates if necessary, following the above procedure.

#### **D. Review documents**

8. The written submissions from the scientists in each research Group and Section form the framework for the Review. They should be equally balanced between achievements and future plans, providing a comprehensive overview of the work performed during the last five years and of future short-, medium- and long-term research plans, of how this work fits with the IARC Medium-Term Strategy and its contribution to IARC's mission. The papers should provide sufficient detail for the Review Panel to assess the quality of the research proposals, the Section/Group's expertise and its abilities to achieve the goals.

9. The review documents should, subject to discussion between the Review Panel Chair and the Director, be prepared in the format detailed in Annex 1 below. Where a Section is composed of two or more Groups, an additional short Working Paper will be prepared for the full Section giving a general description, its strategic vision, its role within IARC, and its operational management.

10. The material relevant for the review should be distributed to the members of the Review Panel at least two months before the site visit.

11. The reviewers may query some elements of the report in advance with the Section Head. All these queries go through the Review Panel Chair to ensure that all Panel members are aware of the query and the response.

#### **E. The Review**

12. The Review Panel will conduct an in-depth evaluation of the past performance and planned activities of the Section and Groups and an assessment of their alignment to IARC's Medium-Term Strategy. In addition to providing an evaluation of the scientific output as a whole, the Review will include an assessment of the standing, managerial ability and research output of the Section, Deputy Section and Group Heads. The evaluation should go beyond the traditional academic measures used in the assessment of research quality (e.g. scientific discoveries, publications, extra-budgetary funding etc.) and also take into consideration indicators related to the particular mandate and mission of IARC, including contribution to the creation of collaborative networks, contribution to training and capacity building in developing countries and impact on the development of cancer control policy. In summary the Review Panel will assess:

- the quality of the scientific research programme;
- the congruence of the research programme with IARC's strategy;
- the broader contribution of the research Section/Group to the Agency's mission.

13. Where there are two or more Groups in a Section, the Review Panel Chair should assign at least two Panel members to review each Group, two months before the review. A panel member may be assigned more than one Group where necessary.
14. Because of time constraints during the Review meeting, it is suggested that a draft report, which will form part of the Consensus Statement, be produced prior to the meeting by the Review Panel members, based on the material provided.
15. The draft report should be based on the format of the Consensus Statement as given in Annex 2 below, but may be modified following discussion among the Review Panel. This draft report should be circulated to the other reviewers in advance.
16. The timetable of the review will be agreed in advance by the Chair of the Review Panel and the Director following submission of a draft timetable by the Secretariat.
17. The Director and Section, Deputy Section and Group Heads will have an opportunity for individual private meetings with the Review Panel.
18. Each Section/Group Head will make a brief presentation (approximately 30 minute presentation, 45 minute discussion, 30 minute evaluation). The presentation and discussion are conducted in the presence of all Section staff but the evaluation is carried out by the Review Panel in closed session. The presentation should be focused on the Section/Group's strategic plan and how this is to be achieved by the projects described in the Working Paper. The emphasis should be on research plans; only highlights of the past five years' achievements should be briefly presented. This session will provide the opportunity for the Review Panel to probe the details of the proposals and the ability to deliver the programme.
19. Following each presentation, the Review Panel will meet privately to discuss its findings and to identify any issues for which further clarification is required. The Section, Deputy Section and Group Heads may then be invited to respond to any queries and to discuss other pertinent issues.
20. The Review Panel members will also have an informal meeting with the scientists, students and post-docs in the Section. Junior members of the Section being reviewed will prepare posters that will be displayed in the area where lunch- and tea-breaks will be taken. The Review Panel will comment on the quality of the training environment.

## **F. Presentation and discussion of results**

21. At the end of the Review, the Section, Deputy Section and Group Heads and the IARC Director will be debriefed by the Review Panel. This will include a brief summary of the assessment of the Panel and notification of the scores for the components of the programme.
22. The Review Panel will draft a Consensus Statement summarizing its findings and conclusions, based on the format in Annex 2 below.
23. Each Section/Group Head will be invited to identify any factual inaccuracies, which will be corrected and, if he/she wishes, to comment on and respond to the Consensus Statement. The Review Panel will then finalize its Consensus Statement for presentation to the IARC Scientific Council.

## **G. Submission to Scientific Council**

24. The Consensus Statement of the Review Panel is provided to the IARC Scientific Council at the session immediately following the Review.
25. The Chairperson of the Review Panel will attend the Scientific Council meeting to present the report.
26. At this Scientific Council session, the Section/Group Head reviewed may be invited to respond to questions or to express responses to the review, but this must not imply any element of re-review.
27. The Director will respond to the findings of the Review Panel.
28. The Scientific Council discusses the Consensus Statement, the Director's response, finalizes and accepts the "Scientific Council Review Report of the Section" as a Scientific Council Working Paper. The Scientific Council summarizes the outcome of the review process as a part of its report to the Governing Council at its session following the Scientific Council.

## **H. Process resulting from the Review**

29. In the event that the work of a Group, Section or individual researcher is determined to be unsatisfactory in terms of the science or in its alignment or contribution to the IARC strategy, the research may be terminated and the Section/Group disbanded. In such an eventuality, WHO Staff Rules and Regulations will be applied.
30. Following the meeting of the Scientific Council, the IARC Director will meet with the Section, Deputy Section and Group Heads reviewed to summarize the outcome of the Review.

## **I. Follow-up on the recommendations**

31. During the second Scientific Council meeting after the Review, approximately one year after the review took place, the Director will present the actions that were taken on the Review recommendations.

## ANNEX 1

### Suggested format of Working Paper prior to review (changes in red)

The emphasis is to be on clarity and brevity.

#### For Sections composed of two or more Groups

- i. General description of the Section
- ii. Strategic vision of Section **and contribution to IARC's Medium-Term Strategy (MTS)**
- iii. Role of Section within IARC
- iv. Section's structure and operational management
- v. Recommendations for the Section by previous Review Panel(s)

#### For integrated Sections and for individual Groups within a Section

##### 1. Introduction

- 1.1 General description of the Section/Group
  - 1.1.1 Strategic vision of Section/Group **and contribution to IARC's MTS**
  - 1.1.2 Role of Section/Group within IARC
  - 1.1.3 Current professional (indicate level) and other staff (including Ph.D. students) and visiting fellows
  - 1.1.4 Current vacancies
  - 1.1.5 Professional staff (indicate level) that left IARC in previous five years
  - 1.1.6 Operational management/mandates and responsibilities of senior scientists
  - 1.1.7 Brief CVs of **P staff**
  - 1.1.8 Training programmes/courses attended by Section/Group personnel
  - 1.1.9 Extended CV of Section/Group Head
- 1.2 The Section/Group's contribution to IARC's broader mission (as relevant)
  - 1.2.1 **Involvement in the creation and development of collaborative networks**
  - 1.2.2 **Involvement in the organization of training programmes/courses or other examples of research capacity building**
  - 1.2.3 **Impact on the development of public health policy, national or international guidelines/recommendations**
- 1.3 Recommendations for the Section/Group by previous Review Panel(s)

## **2. Research report**

- 2.1 Past performance by the Section/Group
  - 2.1.1 Overall: landmarks/specific circumstances that influenced performance
  - 2.1.2 List of all significant projects in past five years
- 2.2 For each finished and longer-term ongoing project: 1 page (maximum) summary in the following format:

Title of project [add as many as necessary]

  - 2.2.1 Principal investigator
  - 2.2.2 Role of the Section/Group: initiator or collaborator, names and affiliations of main collaborators
  - 2.2.3 Funding source and amount
  - 2.2.4 Background/motivation
  - 2.2.5 Brief: design and methods
  - 2.2.6 Results
- 2.3 Publication list, containing publications from the Section/Group over the past five years categorized in peer-reviewed papers, book chapters/reviews with the five most significant papers starred
- 2.4 Copies of two key publications; and title pages of other major publications
- 2.5 A list of meetings at which Section/Group members have been invited speakers

## **3. Future research proposal**

- 3.1 Strategic vision of the Section/Group for the next five years
  - 3.1.1 Overall
  - 3.1.2 Short, medium, and long-term goals
  - 3.1.3 Contribution to IARC's MTS
- 3.2 A one to two page summary for each shorter-term ongoing and planned project in the following format:

Title of project [add as many as necessary]

  - 3.2.1 Ongoing/planned
  - 3.2.2 Principal investigator
  - 3.2.3 Role of the Group: initiator or collaborator
  - 3.2.4 Funding source and amount/requested budget
  - 3.2.5 Background/motivation



- 3.2.6 Design and methods (sufficient detail should be provided to allow the reviewers to form an opinion on the feasibility of the proposed work)
- 3.2.7 Expected results and impact
- 3.2.8 Expected completion date
- 3.2.9 Relevance of project to goals of Section/Group and of IARC as a whole
- 3.3 Priority score of the ongoing and planned projects
  - 3.3.1 Essential
  - 3.3.2 Desirable
  - 3.3.3 Useful

If individual projects have been specifically requested or commissioned (e.g. by WHO), please indicate this.

## ANNEX 2

### Suggested format of Consensus Statement of Review Panel

#### 1. The Section/Group's past work

- 1.1 Overview of work in the last five years
- 1.2 Critical appraisal of work in the last five years

#### 2. The Section/Group's future plans

- 2.1 Overview of future plans and strategic vision
- 2.2 Critical appraisal of future plans

#### 3. The Section/Group's assessment (SWOT)

- 3.1 Assessment of Strengths
- 3.2 Assessment of Weaknesses
- 3.3 Assessment of Opportunities
- 3.4 Assessment of Threats

#### 4. Evaluation of the Section/Group

The **past performance** and **future plans** of each Group and of the Section as a whole should be scored independently for **quality** and **relevance**, as follows:

##### a. Assessment of scientific quality (using the six-point scale below)

A single score should be assigned for the work of each Group and for the Section as a whole.

It is essential that in determining their scores reviewers consider the narrative description given for each score.

As the score should reflect the complete portfolio of research from a Group or Section then the peer-review committee may choose a combination of categories to reflect heterogeneity within a Group or Section e.g. F/C.

In selecting a score the reviewers should take account of the role of IARC's research in the context of its mission (see section 1.2 in Annex 1), including conducting work in low- and middle-income countries and research which is difficult for national institutes or centres to perform.

### **Scoring – scientific quality:**

- O** (Outstanding) Outstanding work of the highest international calibre, pioneering and trend-setting. This score will only be applied to exceptional programmes of work, not because a programme was particularly topical or in an under-researched area.
- F** (Forefront) Work that is at the forefront internationally and that, it is considered, will have an important and substantial impact.
- C** (Competitive) Work that is internationally competitive, of high quality, and will make a significant contribution.
- NC** (Not competitive) Work that is not considered competitive or high quality and is unlikely to make a significant contribution.
- U** (Unsatisfactory) Unsatisfactory or poor quality work.
- P** (Preliminary) Work that is too preliminary to rate, which should be continued and monitored/reassessed by the Director in the short- to medium-term with subsequent update to the Scientific Council.

#### **b. Assessment of the relevance of the work to the mission of IARC**

This should include how well the proposed work benefits from IARC's unique position, how well it appears to fit with the IARC strategy and mission and how it might impact on public health and/or policy.

A single score should be assigned for the work of each Research Group and for the Section as a whole.

### **Scoring – relevance to the mission:**

- Perfect fit** This type of work is ideally suited to the mission of IARC.
- Good fit** This type of work is suited to the mission of the Agency.
- Questionable fit** Uncertain.
- Poor fit** Work which should not continue.

Scores should be accompanied by justifications and recommendations for action, where necessary.

## **5. Overall recommendations for the Section/Group**