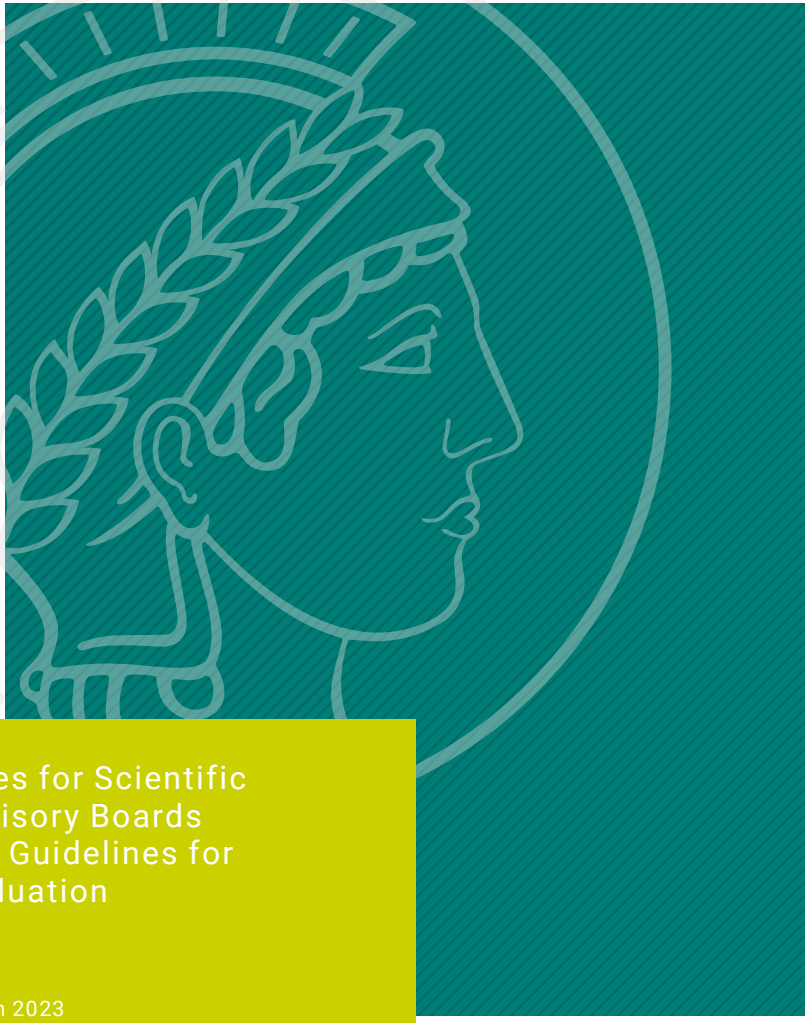
MAX PLANCK
GESELLSCHAFT



Rules for Scientific Advisory Boards and Guidelines for Evaluation

March 2023

Rules for Scientific Advisory Boards and Guidelines for Evaluation

(ReF-Eval)

March 2023

TABLE OF CONTENTS

1. INTRODUCTION

1.1 Mission and profile of the Max-Planck-Gesellschaft

The Max Planck Society for the Advancement of Science is an independent, non-profit research organization in the legal form of a registered association. Despite being largely publicly funded, it is not a state institution.

The mission of the Max Planck Society is to conduct cutting-edge, fundamental research at a peak international level. It regards its primary task as working on areas that are scientifically highly relevant and promising and to move into newly emerging areas of research that lie outside the established disciplines or at the boundaries between them.

Pioneering concepts implemented by outstanding scientists and their teams are of central importance in pursuit of cutting-edge research. Thus, to establish a new field of study, it is essential to recruit scientists with exceptional achievements, original thinking and excellent skills in their field. Max Planck Institutes, most of which are not legally independent, are built up around world-leading researchers. This is the core of the Harnack principle, which dates back to the first President of the predecessor institution of the Max-Planck-Gesellschaft.

The Max-Planck-Gesellschaft is organized in more than eighty Institutes and independent Research Units; these belong to one of three Sections, which together form the Scientific Council:

- Biology and Medicine Section
- Chemistry, Physics and Technology Section
- Human Sciences Section

The Sections discuss matters common to their Institutes. The Scientific Council discusses matters of common interest to all three Sections, particularly those significant for the scientific development of the Max-Planck-Gesellschaft. The

decisions necessary for the functioning of the Max-Planck-Gesellschaft are taken in its five organs. These are the Scientific Council, the President, the Senate, the Executive Committee and the General Meeting of the Scientific Members.

The Scientific Members at the Max Planck Institutes can conduct scientific research freely and independently. Within the parameters defined by the managing bodies of the Max-Planck-Gesellschaft, they decide themselves how and for what purposes their budget is to be deployed.

The structural principle of the person-centred research organization leads to a constant process of scientific renewal in both the Institutes and the organization as a whole. The research spectrum is continually evolving: Institutes and Departments are newly established or realigned to find answers to seminal, forward-looking scientific questions, while others are closed when, for example, their research field has been widely established at universities.

1.2 Evaluation purpose and approaches

Evaluation is integral to successful quality management in science. The Max-Planck-Gesellschaft pays particularly close attention (ex-ante) to its selection of Institute Directors and regularly reviews (ex-post) the results of their work in order to ascertain their present potential. The quality of the evaluation procedure per se is also reviewed on a regular basis.

The Max-Planck-Gesellschaft is convinced that only scientists with excellent expertise in the same or a similar field – peers – are in a position to competently assess the quality of basic research, especially in emerging fields. The evaluation by peers is organized through Scientific Advisory Boards. Such a Board is constituted for each Institute and independent Research Unit.

To provide regular evaluations of the Institute's scientific performance the Scientific Advisory Board usually convenes every three years. For this purpose, the Institutes and Research Units prepare a Status Report in which they present their work as part of a self-evaluation. On this basis, an on-site visit lasting several days is carried out by the members of the Scientific Advisory Board, who formulate their findings and recommendations after an in-depth discussion in a written report.

The Scientific Advisory Boards are an instrument of formative evaluation, with summative ex-post assessments at regular intervals. They thus have a dual function, with the assessment forming the basis for the advisory activities.

The main aims of the evaluation are to assess the quality and originality of research, to review whether the research strategy, the structures and resources are conducive for the research questions addressed, and – in an advisory capacity – to identify areas in need of development and change as well as optimization potentials. Also to be considered is how those framework conditions for research are designed that may have a significant influence on scientific quality, such as the promotion of junior scientists.

EXTENDED EVALUATIONS

For longer-term strategic planning, the view extends beyond individual Institutes: every six years, usually at every second meeting, the Scientific Advisory Board convenes with an extended evaluation mandate, including a stronger focus on assessment relative to the advisory function of the boards.

For the purposes of the extended evaluation, Institutes working in similar areas are grouped into so-called Research Fields; these may include Institutes from different Sections and, in justified exceptional circumstances, may involve only parts of Institutes or Institutes with similar organizational structures. The Research Fields are specified by the President in consultation with the Vice Presidents and in agreement with the Sections. The specification of Research Fields is reviewed at regular intervals.

For each extended evaluation, at least two external Rapporteurs are appointed. The Rapporteurs attend all meetings of the Scientific Advisory Boards of the relevant Research Field. This gives them an overview of the research activities at the Institutes and the focal points within the Research Field, of strategically relevant topics across Institutes, and of the implementation of the evaluations by the Scientific Advisory Boards.

Once the extended evaluation of all Institutes of a Research Field has been completed, the Research Field Commission convenes to discuss and summarize the results of the individual Scientific Advisory Board evaluations under different aspects.

1.3 Procedural guidelines and definitions

The "Rules for Scientific Advisory Boards and Guidelines for Evaluation" (ReF-Eval) serve those involved in the procedure as binding terms of reference governing the (extended) evaluation of Institutes and independent Research Units of the Max-Planck-Gesellschaft by Scientific Advisory Boards and Rapporteurs.

These rules and guidelines are part of the overall framework of regulations and objectives formulated for the Max-Planck-Gesellschaft – for example, the “Guidelines on the Training of Doctoral Students at the Max Planck Society.” Aspects relevant to the evaluation will be communicated to the members of the Scientific Advisory Boards by the responsible Vice President as part of the briefing for the meeting.

If members of a Scientific Advisory Board are requested to act as experts for the Max-Planck-Gesellschaft at other occasions, separate guidelines may apply.

In the following, all regulations relating to Institutes also apply to independent Research Units. In the case of Institutes that have legal personality, their specific legal circumstances must be taken into consideration.

The English translation of the Rules for Scientific Advisory Boards is for informative purposes; only the German version of the text is authoritative.

STATUTORY FRAMEWORK

The reports of the Scientific Advisory Boards, of the Rapporteurs, and of the Research Field Commissions contain information and recommendations serving to advise the Institutes and those organs of the Max-Planck-Gesellschaft which, in accordance with its Statutes, are responsible for decisions concerning the development of the Institutes and of the Max-Planck-Gesellschaft as a whole.

The recommendations do not affect the rights and responsibilities as set out in the Statutes of the Max-Planck-Gesellschaft, in particular of

- the organs responsible for decisions involving structural and/or financial consequences,
- the Institutes' Directors, in particular their authority to determine the selection, order, and execution of the scientific work conducted in their research area,
- the Institutes' Directors, the Sections of the Scientific Council, the Senate, and the President in appointment proceedings.

CONFIDENTIALITY AND CONFLICT OF INTEREST GUIDELINE

The members of Scientific Advisory Boards and the Rapporteurs are asked for a careful, disinterested and unbiased evaluation in accordance with the principles of good scientific practice. By participating, they agree to abide by the confidentiality rules attached in Appendix A that apply to this evaluation procedure and which are made available to the members of Scientific Advisory Boards and Rapporteurs upon their appointment. In justified individual cases, a separate confidentiality agreement to be signed in writing may be necessary, for example at the request of an Institute.

Participants on the part of the Max-Planck-Gesellschaft must treat the meeting documents and the reports of the Scientific Advisory Boards, the Rapporteurs and of the Research Field Commissions confidentially, taking into account their respective responsibilities and in accordance with internal guidelines and due diligence obligations under labour law.

The President or the bodies responsible according to the Statutes of the Max-Planck-Gesellschaft may, in the fulfilment of their tasks, submit results and recommendations of a general, cross-institutional nature, which are of strategic interest to the Max-Planck-Gesellschaft, to other internal bodies for information or discussion.

All participants in the procedure undertake to observe and comply with the regulations specified in the Conflict of Interest Guideline (Appendix B), or, concerning the Rapporteurs, the provisions made in chapter 2.5.

If the Institute of the President, the Vice President, or the Section Chair is involved, the four eyes principle has to be applied and the respective deputy has to be involved in preparing, conducting and following up on the meeting of the Scientific Advisory Board or the Research Field Commission, in accordance with the “Rules of conduct for good scientific practice” of the Max-Planck-Gesellschaft.

2. SCIENTIFIC ADVISORY BOARDS, RAPPORTEURS

2.1 Composition and size of Scientific Advisory Boards

The Scientific Advisory Boards are composed of internationally recognized scientists from Germany and abroad who as a rule are not from the Max-Planck-Gesellschaft itself. The membership shall properly reflect the Institute's research spectrum. In addition, scientists who are less closely connected with the lines of research pursued at the Institute should be appointed. The composition of the board is to allow for diverse perspectives. A minimum share of thirty percent females should be aimed for where this has not already been achieved. In addition, the members must bring together sufficient understanding of the German science system and of the topics referred to in Appendix E.

In principle, it is possible to be a member of more than one Scientific Advisory Board. As a rule, scientists with emeritus status or who have retired should not become new members of a Scientific Advisory Board. Members of a research institution in the direct vicinity of the Institute should not be appointed.

As a rule, the number of Scientific Advisory Board members should total at least five and no more than fifteen. The size of the panel should be appropriate to the size of the Institute, the scope of its research activities, and the number of Research Groups. In justified cases, experts may be called in on an ad hoc basis for a meeting.

2.2 Selection and appointment of members and ad hoc experts

The members of the Scientific Advisory Board are appointed by the President of the Max-Planck-Gesellschaft after consultation with the Vice President representing the Section to which the Institute belongs. To this end, the Institute submits to the Vice President a list of at least twice as many nominations as new members are to be appointed to the board, with brief justifications for each nomination.

Lists that do not contain any female scientists without a valid justification will be rejected. In accordance with the Conflict of Interest Guideline in Appendix B, the Institute must disclose facts that could represent a conflict of interest. For this reason and for matters of transparency, care should be taken that all those to be evaluated individually in accordance with the regulations in chapter 3.1 are adequately involved in creating the list of suggestions.

The Vice President, with the support of the Administrative Headquarters, examines possible reasons for bias, can reject or request additional proposals and supplement own proposals or proposals of the Scientific Advisory Board. The Vice President then submits a list to the President, who makes the final selection that may deviate from the proposals. The Institute will be informed about the selected persons and can submit a statement via the Managing Director, e.g. in case there is a potential conflict of interest or in case of doubt regarding the expertise of a reviewer or as to whether the research spectrum of the Institute is sufficiently covered.

The procedure for proposing and selecting experts for a Scientific Advisory Board meeting on an ad hoc basis corresponds to the procedure for regular Scientific Advisory Board members – apart from the fact that one proposal per ad hoc position may be sufficient in exceptional cases with appropriate justification.

2.3 Terms of office of members of Scientific Advisory Boards

As a rule, the term of office for each member of the Scientific Advisory Board is six years and can be extended once by three years up to a maximum term of nine years. Exceptions are only possible in particularly justified cases, especially when an Institute undergoes restructuring. Separate regulations apply to the term of office of the Chair.

In order to bring in new perspectives on the one hand and to provide for continuity on the other, the members of the Scientific Advisory Boards are appointed with overlapping terms of office. About one third of the Scientific Advisory Board should be newly appointed compared to the previous meeting.

The President may, after consultation with the responsible Vice President, revoke or suspend board membership for good reason. Possible reasons are, for example, a significant reorientation of the Institute, the retirement of a Director, or conflicts of interest. The latter are to be reported immediately by the Institutes themselves and by the members of the Scientific Advisory Board (see Appendix B).

2.4 Chair, Deputy Chair: appointment and terms of office

The Chairperson of the Scientific Advisory Board is appointed by the President upon the proposal of the responsible Vice President, who consults with the Institute beforehand for this purpose. The appointment shall take place before the meeting of the board – also for Scientific Advisory Boards of newly founded Institutes.

If possible, there should always be a Chairperson in office, so that a contact person is available between board meetings. Therefore, the appointment is made for an open-ended term, until a different Chairperson is appointed.

In cases where the Chairperson is no longer able or willing to perform the task (for example, because of a conflict of interest), the Deputy Chair of the last meeting will take over, if possible, until the position is filled again.

The Deputy Chair is selected by the Chairperson in consultation with the Vice President at the beginning of each Scientific Advisory Board meeting from among the members of the board.

2.5 Extended evaluation: appointment of Rapporteurs

For the extended evaluation, at least two Rapporteurs are appointed who, like the members of the Scientific Advisory Boards, are internationally recognized scientists and do not come from the Max-Planck-Gesellschaft. They should be able to assess the Research Field as a whole. Especially if a Research Field is very broad or heterogeneous, more than two Rapporteurs may be appointed. As balanced a gender ratio as possible is to be aimed for.

The Rapporteurs are appointed for each extended evaluation of a Research Field by the President of the Max-Planck-Gesellschaft in consultation with the responsible Vice President. The Institutes may submit proposals.

If possible, only persons who have not already been Rapporteurs for an extended evaluation within the Max-Planck-Gesellschaft should take on this task. They shall not currently be a member of a Scientific Advisory Board at an Institute that is part of the relevant Research Field and should not have been so in the six years prior to appointment. Individuals who are asked to serve as Rapporteurs are required to disclose potential conflicts of interest to the President, the Vice President in charge or the Administrative Headquarters of the Max-Planck-Gesellschaft immediately after receiving the request.

3. THE EVALUATION PROCEDURE

3.1 Subject of the evaluation

Subject of the regular evaluations by the Scientific Advisory Board is

- the Institute or independent Research Unit

and the performance of those scientists who are supervising other researchers and who are primarily responsible for setting the Institute's research agenda or contribute to it:

- the Scientific Members of the Max-Planck-Gesellschaft working at the Institute (involving Emeritus Groups where appropriate)
- the heads of (Junior) Research Groups.

The conditions for research are also taken into account, namely at the level of the Institute or independent Research Unit and its individual Departments, Research Areas, and Groups.

Regardless of how they are financed, the (Junior) Research Groups Leaders with a limited funding period are to be evaluated by the Scientific Advisory Board to receive external feedback on their research and on career prospects.

The Scientific Advisory Board can be asked by the Institute's Board of Directors to include the research activities of Max Planck Fellows in the evaluation. Fellows are university teachers who are appointed for a limited period of time to carry out research projects together with members of the Institute.

In the case of extended evaluations, not only the period under consideration is expanded (performance and developments in the past six years instead of as a rule the past three years) but also the subject of evaluation: the scope of the evaluation is widened from a focus on individual Institutes to a specific field of research within the Max-Planck-Gesellschaft as well as the evaluation process itself.

3.2 Evaluation frequency

As a rule, the Scientific Advisory Board convenes every three years. In the case of newly founded Institutes and Departments, the Scientific Advisory Board should therefore conduct an initial evaluation approximately three years after the start of research activities. With new Institutes, it is taken into account whether, for example, the Institute is resulting from a merger or splitting-up of existing Institutes or whether a ramp-up phase brings along unexpected challenges.

Depending on the respective Institute's schedule for the Scientific Advisory Board meeting, newly established Departments can and should present their work to the Advisory Board earlier than about three years after the start of research activities. In such cases, the Scientific Advisory Board will put a stronger focus on giving advice and on the development potential but can also make a first tentative assessment.

The evaluation cycle is determined by the President in consultation with the responsible Vice President. An evaluation cycle of two years is foreseen in particular for Institutes in a development or transition phase. In justified cases, the President may arrange an extraordinary evaluation by the Scientific Advisory Board – of the Institute as a whole or of specific research areas.

Care must always be taken that the meeting dates remain within the six-year cycle of the extended evaluation of the Research Field of which the Institute is a member. The extended evaluations of the Institutes combined in a Research Field should be closely linked in time.

The date of each meeting is set by the Institute as early as possible, in consultation with the office of the responsible Vice President and the Administrative Headquarters of the Max-Planck-Gesellschaft. In the case of an extended evaluation, coordination with the office of the President is required in addition.

3.3 Status Report of the Institute

The main written basis for the work of the Scientific Advisory Board is a Status Report prepared by the Institute, which is made available to the members of the Scientific Advisory Board by the Managing Director of the Institute in good time before the meeting. The Status Report consists of an Institute-specific part and individual research reports. It is to provide a comprehensive account of the scientific achievements of the Institute and its Departments, Work Areas and Groups, a thorough overview of the framework conditions for research and of the plans for the coming years.

The reporting period roughly covers the period since the last board meeting. For extended evaluations, planning and overviews over a six year period can be inserted as a supplement. Instructions on the contents of the report can be found in Appendix C. Due to the international composition of the Scientific Advisory Boards, the reporting language is usually English.

The Status Report may consist of either a report prepared specifically for the Scientific Advisory Board or a publicly available research report in combination with documents put together specifically for the meeting. If information is made available digitally, care must be taken to ensure that confidential data is protected from unauthorized access and that the content essential to the evaluation is documented in accordance with the retention periods.

In order to fulfil their mandate, the members of the Scientific Advisory Board may obtain additional information from the Institute's Managing Director or the scientists to be evaluated individually.

3.4 On-site meeting of the Scientific Advisory Board

To gather an impression of specific workplaces and of working conditions, the Scientific Advisory Board holds its meeting at the Institute. The draft of the schedule is drawn up by the Managing Director of the Institute in consultation with the Administrative Headquarters of the Max-Planck-Gesellschaft. The draft has to be approved

by the Vice President, and the Chairperson of the Scientific Advisory Board has to be informed about the planned agenda in good time before the meeting to be able to co-determine the schedule, where necessary.

All those who are to be evaluated individually are to be given the opportunity to present their research findings and plans to the Scientific Advisory Board in person, for example by giving a talk or presenting a poster. Wherever possible, the members of the Scientific Advisory Board should also conduct individual consultations with the Scientific Members at the Institute. If necessary, additional individual consultations are to be arranged, e.g., with the member of scientific staff elected to the Section, the heads of Junior Research Groups, Department representatives, the Equal Opportunity Officer or the representation of doctoral researchers. The Scientific Advisory Board shall also have the opportunity to conduct talks with the doctoral researchers and the postdoctoral researchers at the Institute.

The Chairperson can influence the course of the on-site visit. Taking into account the sample agenda (Appendix D), the Chairperson can request changes on behalf of the Scientific Advisory Board, in particular in terms of time slots, priority settings, and the respective groups of participants. If needed, the board members may split up. The Chairperson of the Scientific Advisory Board determines the allocation of responsibilities in agreement with the board members at the beginning of the inspection.

The Managing Director sends out the invitation and the agenda in good time before the meeting and provides the necessary documentation. The invitation is sent to all persons participating in at least one agenda item. Aspects to be considered are:

- The responsible Vice President should always participate in the institute visit by the Scientific Advisory Board, to take over the briefing and debriefing of the Scientific Advisory Board and to conduct discussions on site.
- The President of the Max-Planck-Gesellschaft, the Secretary General, and delegates from the Administrative Headquarters are also entitled to participate.
- The introductory report as well as the scientific presentations should as a rule be open to the staff of the Institute.
- In the case of extended evaluations, the Rapporteurs participate in all open and internal sessions of the Scientific Advisory Board at each evaluation within a Research Field.

Non-members of the Scientific Advisory Board are not present when the board retires for its final internal deliberations to prepare its report. Due to the sensitive nature of certain topics of discussion, the Chairperson may also exclude the participation of individuals already at an earlier stage if their participation in the content presented conflicts with any justified interests. The Scientific Advisory Board may consult the Vice President or Institute Liaison Manager any time if they have questions about individual issues.

In exceptional cases, meetings can take place completely or partially via video conference. The decision on this lies with the President after consultation with the responsible Vice President.

Members of the Scientific Advisory Board may – in agreement with the Institute's Board of Directors and taking into account the Conflict of Interest Guideline (Appendix B) – visit the Institute at times other than a regular board meeting.

3.5 Report of the Scientific Advisory Board

Following the inspection and taking into account the criteria and guiding questions set out in Appendix E the Scientific Advisory Board prepares a final report.

The report should highlight positive aspects as well as areas in which improvement should be sought. In addition to the assessments, recommendations are expected to be derived from them. An overview of the points to be covered in the report is provided in Appendix F.

Recommendations or questions directed to the Institute or the President, to which a response is expected, must be explicitly worded and identified as such. If the report makes recommendations or comes to conclusions that do not have the unanimous approval of all members of the Scientific Advisory Board, then these divergent opinions shall also be stated in the report.

The Chairperson is responsible for ensuring the timely and proper completion of the report and for submitting it to the President of the Max-Planck-Gesellschaft within two months of the meeting of the Scientific Advisory Board. Should the Chairperson not be in the position to meet this deadline, the Deputy Chair assumes responsibility for this task.

In cases in which the Scientific Advisory Board considers its evaluations to be particularly problematic, the Chairperson of the Scientific Advisory Board supplements the report with a confidential letter to the President. Contrary to the report, this letter is not forwarded to the Institute's Board of Directors, but its contents are discussed with the person concerned. The problems or deficits described in the letter must at least be alluded to in suitable form in the report; the content of the report and the letter must not be contradictory.

3.6 Extended evaluation: tasks of the Rapporteurs

The Rapporteurs are not members of the respective Scientific Advisory Boards and do not carry out their own independent evaluation of the performance of the scientists at the Institutes. Rather, they gain a general overview of the implementation and outcomes of the whole set of evaluations and of the Research Field by participating in the meetings of the Scientific Advisory Boards within the Research Field.

After participating in the Scientific Advisory Board meetings and in preparation of the meeting of the Research Field Commission, the Rapporteurs prepare a joint report and submit it to the responsible Vice President. The report should cover the following topics:

- Evaluation procedures: The Rapporteurs make a comparative assessment of the implementation of the evaluation at each Scientific Advisory Board meeting within the Research Field. This may cover the composition of the boards, the information provided by the Institutes, the agenda and organization of the on-site meeting, and the application of the evaluation criteria. To a limited extent this may include commenting on or supplementing the assessment of the research performance by the Scientific Advisory Board.

- Research Field: The Rapporteurs provide an assessment of the visibility of the individual Institutes in an international perspective. They identify opportunities and discuss future perspectives of the Research Field and its sub-areas and may formulate recommendations on whether and how the Research Field should be restructured.

- Strategy: Based on their cross-institutional perspective, the Rapporteurs can and should also focus on aspects and topics that are of general strategic importance for the Max-Planck-Gesellschaft, such as measures to support junior scientists, the promotion of diversity and equal opportunity, or the recruitment of top researchers. The structure and size of Institutes can also be addressed.

3.7 Extended evaluation: Research Field Commission

Once the extended evaluation of all Institutes in a Research Field has been completed, the Research Field Commission convenes. It is composed of

- the Rapporteurs,
- the Chairpersons of the Scientific Advisory Boards within the Field,
- the responsible Vice President (Chair),
- the Section Chair.

The President, the Secretary General, and delegates of the Administrative Headquarters of the Max-Planck-Gesellschaft participate as guests.

Based on the reports compiled by the Scientific Advisory Boards and the written report of the Rapporteurs, the Commission deliberates on

- the results of the individual Scientific Advisory Board meetings, taking into account the effective and efficient use of resources from a medium-term perspective,
- the implementation of the evaluations or the evaluation procedure itself,
- the position of the Institutes in international comparison and the prospects for development of individual Institutes or the Research Field,
- recommendations for restructuring or, if necessary, the need to reallocate resources within a Research Field,
- aspects and topics of general, cross-Institute strategic importance, such as recruitment policies, diversity and equal opportunity, or the support for junior scientists.

Under the leadership of the Vice President a summary report of the meeting of the Research Field Commission is prepared. The President forwards the report to the Managing Directors of the Institutes grouped in the Research Field.

3.8 Follow-up and possible consequences of (extended) evaluations

After each meeting of a Scientific Advisory Board, the President of the Max-Planck-Gesellschaft consults with the responsible Vice President about the results of the evaluation and requests via the Managing Director a detailed response to the report of the Scientific Advisory Board from the Institute's Board of Directors. The President provides the Chairperson of the Scientific Advisory Board with the Institute's response.

The leaders of Junior Research Groups who have been evaluated individually according to the provisions in chapter 3.1 have the right to receive in written form at least that part of the report of the Scientific Advisory Board that directly concerns them. The requirement of confidentiality also applies to such excerpts.

Taking into account the regulations on confidentiality (see chapter 1.3), the Managing Director shall ensure that the other staff members at the Institute are also informed about the results of the Institute evaluation in an appropriate, general form – especially about those aspects that may affect the future planning of the Institute and individual career perspectives.

In order to determine whether and in which way the recommendations and questions of the Scientific Advisory Board have been considered, they are to be discussed in the Status Report and in the introductory report of the Institute's Managing Director at the following meeting of the Scientific Advisory Board (see Appendices C and D).

The Chairperson or Deputy Chairperson of the Scientific Advisory Board can be invited to attend the meeting of the Board of Trustees of the Institute to report on the work of the board and the overall assessment of the Institute in a national and international context.

Following an extended evaluation it is recommended that the respective Section invites the members of the Research Field Commission to participate in the subsequent meeting of the Perspective Commission, which develops recommendations for the Section on all relevant scientific and strategic topics as well as on the optimization of procedures and processes.

The results of the meetings of the Research Field Commissions are presented to the Senate of the Max-Planck-Gesellschaft by the responsible Vice President. In this way, the supreme decision-making and supervisory organ of the Max-Planck-Gesellschaft is informed about the appropriate use of the funds and the results of the quality assurance process. In addition to scientists and members drawn from the Max-Planck-Gesellschaft itself, the Senate also includes representatives from business, politics, the media, and other areas.

Depending on a clearly negative performance evaluation by the Scientific Advisory Board, the budget of a Research Area or Department can be reduced within the framework of an extended evaluation. As a rule, the reduction does not exceed twenty-five percent of the budget estimates. Decisions on changes in the resources are taken by the Executive Committee on a proposal from the President.

APPENDICES

A Confidentiality Guideline

All documents and information that have been made available or accessible in connection with the activity as a member of a Scientific Advisory Board or as a Rapporteur or have been obtained otherwise must be treated confidentially and protected from access by unauthorized persons (so-called Confidential Information). This includes in particular the Status Reports of the Institutes (including any research results contained in the Status Reports), the assessments and recommendations of the Scientific Advisory Board resulting from the procedure, the information obtained from the consultations, and the statements of the Rapporteurs and Research Field Commissions. The obligation to maintain confidentiality applies regardless of whether the information in question is marked "confidential" or "secret", and the obligation of confidentiality shall continue to apply indefinitely beyond the duration of the activity as a member of a Scientific Advisory Board or as a Rapporteur.

The members of the Scientific Advisory Boards or Rapporteurs undertake to treat the Confidential Information strictly confidentially and with due diligence, not to disclose it to third parties and not to use it for their own purposes. Any forwarding of Confidential Information is permissible only insofar as it is in accordance with the present "Rules for Scientific Advisory Boards and Guidelines for Evaluation".

The obligation of confidentiality shall not apply to information which was already lawfully known to the member of the Scientific Advisory Board or the Rapporteur; was previously known to the public or generally accessible; became known to the public or generally accessible after the communication without the cooperation or fault of the member of the Scientific Advisory Board or the Rapporteur and which the member of the Scientific Advisory Board or the Rapporteur independently developed or had developed independently of the knowledge.

B Conflict of Interest Guideline for Scientific Advisory Boards

The purpose of this Guideline is to achieve the most objective and independent assessment possible and to avoid even the appearance of conflicts of interest. A conflict of interest is a constellation in which there is a risk that a secondary interest of a personal or institutional nature will jeopardize the primary interest of the Max-Planck-Gesellschaft in a review as defined in these Guidelines. The Guideline is to be observed upon occasion of the appointment of Scientific Advisory Board members and for the duration of the terms of office. It applies to matters in connection with the unit to be evaluated (Institute/Research Unit, Department/Work Area/Group).

All parties involved in the process are responsible for compliance with and monitoring of this Guideline: the Institutes, the President and Vice President (supported by the Administrative Headquarters), members of the Scientific Advisory Boards, and scientists requested as members or ad hoc experts. Potential conflicts of interest must be disclosed immediately to the required extent and, if possible, in writing to the Vice President or the Administrative Headquarters, and appropriate measures must be taken to prevent or remedy them.

Circumstances in which there may be a concrete risk of a conflict of interest, will result in exclusion – from the board or from the evaluation of a sub-unit of the Institute – or in a case-by-case decision on appropriate measures. The decision is made by the President in consultation with the responsible Vice President. If concrete conflicts of interest that give rise to an appearance of bias come to light during the evaluation, the Chairperson of the Scientific Advisory Board decides on the measures in consultation with the Vice President. Circumstances that could give rise to the appearance of bias and measures taken should be made transparent and be documented.

The following circumstances generally lead to **EXCLUSION** *from the Board or from the evaluation of an individual Department, Work Area or Group due to bias:*

- relationship up to/including the third degree, marriage, civil partnership
- official dependency or supervisory relationship up to and including the postdoc phase up to six years after termination
- mutual reviews in the year before or after the planned meeting date
- ongoing or planned close economic or scientific cooperation, for example as a Max Planck Fellow at the same Institute or in a joint research project
- imminent transfer to the Max Planck Institute
- External Scientific Member of the Max-Planck-Gesellschaft

In the following cases (current, planned or in the last six years before the planned meeting date) a **CASE-BY-CASE DECISION** *is foreseen:*

- scientific cooperation, e.g. joint publications; joint supervision of doctoral researchers or postdocs; simultaneous activity in committees or scientific networks; co-editorships, etc.
- affiliation with the same institution in a secondary position
- research stay(s) at the Max Planck Institute or the home institution of the Scientific Advisory Board member
- mutual reviews with a longer time interval than mentioned above
- conflict or competition situations; financial interests
- Rapporteur for an extended evaluation
- Max Planck Fellow at another Max Planck Institute
- candidacy for a Director position at the Max-Planck-Gesellschaft (on-going terms of office are suspended until a final decision is taken)

C Status Report of the Institute: contents

The Status Report should address all of the items listed below where applicable, but the order and grouping may be varied. For each topic, it is indicated whether it is relevant at the Institute level and/or for the Departments, Work Areas and Groups (individual Research Reports).

The individual Research Reports should be limited to a maximum of ten pages per Department or Work Area and five pages per Junior Research Group and each should include a short academic curriculum vitae.

INTRODUCTION *(Institute)*
Current and planned developments, future orientation; optional:
scientific highlights

RESPONSE TO RECOMMENDATIONS from the previous board meeting
(Institute; individual Reports)

MISSION AND PROFILE *(Institute; individual Reports)*
Vision (cross-institutional and/or for each Department or Work Area), research programme (goals and priorities)
Self-positioning in the national and international research environment and the research field as part of a self-evaluation (e.g. SWOT analysis) and assessment of the significance of the research activities and results

- overview of projects with significance for the Institute as a whole (e.g. large-scale projects, interdepartmental projects, etc.) (optional)

RESEARCH STRATEGY AND ACHIEVEMENTS *(Institute; individual Reports)*
Research concept, methods and findings; scientific highlights; new initiatives and plans

- external lectures, conference contributions, professorships offered
- scientific awards and prizes, personal grants
- memberships in professional societies, etc.
- research output, e.g. software, databases and datasets, catalogues, instruments; a list of publications for the reporting period, indicating the most important ones (no more than five); these should be made available as full texts
- optional: bibliometric/citation analyses

GOVERNANCE AND COMPLIANCE *(Institute)*
Institute structure and organization (Departments, Areas, Groups); administration, services
Decision-making processes, conflict management, internal quality assurance; rules, procedures and processes to ensure and promote compliance

- organizational chart, optionally with affiliation of the Groups, etc.
- workflows, list of measures, etc., if applicable

STAFF, BUDGET, EQUIPMENT AND FACILITIES *(Institute; individual Reports)*
Overview of the personnel structure (recent developments, plans) and of the Institute's funding (structure and development)
Overview of material resources, equipment, and spatial arrangements (scientific infrastructure and service facilities, IT, etc.)

- staffing plan; in aggregated form: ratio of scientific to non-scientific and temporary to permanent positions at various career levels, differentiated by type of position, gender, country of origin, funding; age distribution; fluctuation; dates of new recruitments/upcoming retirements concerning key positions
- (institutional) funding, third-party funding, other income; development of expenses by type of expenditure; overview of projects financed by third-party funds
- data on service facilities, etc., if applicable

PROMOTION OF JUNIOR SCIENTISTS (DOCTORAL RESEARCHERS AND POSTDOCS) *(Institute; individual Reports)*
Structures, programmes, and strategies for recruiting, supervising, and promoting doctoral researchers and postdocs (e.g. mentoring, conveying principles of good scientific practice, career development measures, etc.) and how they are integrated into the Institute

- scientific degrees offered, average duration of doctorates
- number and funding of doctoral researchers (optionally with topic of thesis), postdocs and Junior Research Groups (with start date and affiliation)
- primary contact person(s) for junior scientists, if applicable
- participation in Thesis Advisory Committees and/or number of doctoral researchers who are supervised as main supervisor in each case
- overview of the career paths of junior scientists after leaving the Institute

DIVERSITY AND EQUAL OPPORTUNITIES
(Institute; individual Reports on the level of Departments/Work Areas)
Goals and measures (e.g. regarding an inclusive work culture or to reconcile the demands of family and career), structural integration (e.g. of the Equal Opportunity Officer)

- proportion of women and international staff at various scientific career levels (refer to staff structure, if applicable)
- statistics on recruitment (e.g. of doctoral researchers) and guest scientists, differentiated by gender and nationality
- if applicable, percentage of employees with severe disabilities
- overview on events, courses, etc.
- capacities of child care facilities, etc.

COOPERATION AND NETWORKS *(Institute; individual Reports)*
Cooperation and communication within the Institute
Cooperation with other Max Planck Institutes, universities, research institutions and/or individual researchers
Participation in external research programmes, projects, and networks
Activities in alumni management (of the Institute or MPG-wide)

- overview/key data on programs, projects, events, symposia, etc.
- joint appointments, teaching activities, etc.
- list of visiting scientists (main affiliation, duration of stay; possibly information on research activities)
- optional: overview of interdepartmental publications/projects (can be part of a bibliometric analysis)

KNOWLEDGE TRANSFER, PUBLIC RELATIONS
(Institute; individual Reports)
Transfer of knowledge to industry, business, politics and/or society (cooperation, activities, highlights, etc.); exploitation of research findings
Public and press relations, science communication
Open Science/Open Access strategy and/or strategy for the long-term archiving of research data and results

- events, lectures, consulting activities, etc.
- patents/licenses, spin-offs, cooperation with industry, etc.
- public science/public relations activities
- OA/OS activities and publications (optional: refer to list of publications)

IMPLEMENTATION OF THE "WHITE PAPER ANIMAL EXPERIMENTS IN THE MAX PLANCK SOCIETY"
(Institute and/or individual Reports, if applicable; a template is provided separately)

D On-site visit: sample agenda

The sample agenda defines mandatory core elements and lists optional components. The total duration may vary depending on the size of the Institute. For each agenda item, the participants must be specified. For extended Scientific Advisory Board meetings, the Rapporteurs join the panel, and the President usually joins the concluding discussion of the Scientific Advisory Board with the Vice President.

APPROXIMATELY ONE WEEK BEFORE THE MEETING
Vice President: Briefing of the Board's Chairperson (as needed)

DAY 1

Meeting Vice President, Scientific Advisory Board
(jointly or consecutive)
Introduction and briefing; information on Conflict of Interest Guideline
Appointment of a Deputy Chair
Setting of priorities, agenda, assignment of tasks

Introduction: Report of the Managing Director
Profile, development, achievements and future planning of the Institute
Response to recommendations of the Scientific Advisory Board
Extended evaluation: information on the Research Field; overview of the past six years

Scientific presentations: Scientific Members, Junior Research Groups

Meeting of the Scientific Advisory Board

DAY 2

Scientific presentations (continued)

Lab visits/Institute tour (optional)

Poster session/presentations
(Junior Research Group Leaders with Scientific Advisory Board;
optional: doctoral researchers, postdocs)

Discussion Scientific Advisory Board with doctoral researchers
Discussion Scientific Advisory Board with postdocs
Discussion Scientific Advisory Board with Junior Research Group Leaders
Discussion Scientific Advisory Board with the management of central (service) facilities (optional)
If desired by the Vice President: parallel discussions with the groups mentioned above and the representation of doctoral researchers

Time slot for questions of the Scientific Advisory Board to Scientific Members, Group Leaders, Administration or for individual consultations (optional)

Meeting of the Scientific Advisory Board: first draft of the report

DAY 3

Meeting of the Scientific Advisory Board: final consultation

Meeting Scientific Advisory Board with Vice President (extended evaluations: also with the President): short report, debriefing; proposals regarding the composition of the Scientific Advisory Board (optional)

Meeting Scientific Advisory Board with Scientific Members: feedback (optional: individually) and concluding discussion

Meeting of the Scientific Advisory Board: draft of the report (optional)

E Evaluation criteria and guiding questions

The criteria and guiding questions listed below form the basis for a thorough and meaningful evaluation in three dimensions:

- **Scientific Performance** (profile and visibility, results and achievements, research plan and collaborations)
- **Management and Governance** (strategy and human resources, structures and processes)
- **Leadership** (mentoring and talent development, communication and work culture)

The evaluation of research performance is to recognize the need to afford Institutes and individual researchers reasonable opportunity to pursue new paths with an increased risk of failure.

The performance must be assessed predominantly using qualitative benchmarks, with quantitative indicators only being incorporated into the overall assessment in a differentiated and reflected way. Grades are not to be assigned. If terms such as "outstanding", "excellent", "very good", "good" or "average" are used to classify the research performance in an international perspective, this must be sufficiently substantiated in each case.

For extended evaluations, the Scientific Advisory Board should place a greater emphasis on assessing performance; for the board meetings in between, the focus can be more on providing advice.

With junior researchers it has to be taken into consideration that they are at the beginning of their professional careers.

I. INSTITUTE

I.1 Scientific Performance

- How is the significance and scientific quality of the Institute within its field to be assessed in a national and international context?
- Which scientific activities can be described as outstanding?
- Which scientific ideas and fields have a high potential for development?
- What are the development perspectives of the Institute as a whole – especially in the case of forthcoming retirements?
- Of what quality and effectiveness is cooperation with other Max-Planck-Institutes, universities, and other research institutions in Germany and abroad and the integration into national and international projects and programmes?
- If applicable: How visible are the structured graduate programmes at the Institute, and how does their research focus fit into the profile of the Institute?

I.2 Management and Governance

- Are the management and organizational structures and the processes for decision-making and conflict resolution convincing and set out transparently?
- Is the research strategy sufficiently communicated within the Institute?
- Are the support structures for the promotion of junior scientists sufficient, of high quality, and well-integrated?
- How convincing and effective are the concepts and measures for the promotion of diversity and equal opportunities and for managing diversity?
- Are there proposals for changes and – possibly – restructuring?

II. DEPARTMENTS, WORK AREAS AND RESEARCH GROUPS

II.1 Scientific Performance

- How is the research performance to be assessed from a national and international perspective with regard to its significance, originality and (potential) impact?
- Are the medium-term research programme and the chosen approaches and methodologies coherent, well-reasoned and of high quality?
- Of what quality and effectiveness are the research collaborations?
- Are the personnel structure, the use of funds (incl. third-party funds) and the plans for the future adequate to achieve the goals of the research programme? Are there – especially in extended evaluations and taking into account the research goals – recommendations for increasing efficiency?
- How is the transfer of knowledge to other areas of society (besides science) to be assessed?

II.2 Leadership

- Is an atmosphere created in which – with high performance standards – the potential of scientific staff members can unfold?
- Is the supervision and mentoring of junior researchers adequate and are they sufficiently supported in their career development?
- Are expectations and responsibilities clearly communicated and is constructive feedback provided where required?
- Are legal and ethical standards, acting with integrity, and the principles of good scientific practice sufficiently conveyed and put into practice?
- Is cooperation with other Departments, Areas or Groups encouraged, where appropriate?

F Report of the Scientific Advisory Board: contents

The Scientific Advisory Boards are expected to refer to the criteria and guiding questions (Appendix E) in all areas in which it is appropriate to do so and to provide a comprehensive, well-argued assessment in each case. The following draft outline serves as an orientation; the order and weighting of the topics can be adapted.

The report is to include separate sections for both the Institute as a whole and its individual Departments, Areas and Groups.

Like the Institute's Status Report, the report should roughly cover the period since the last board meeting and take into account future plans. In the case of extended evaluations, the last six years can be taken into account where applicable.

INTRODUCTION AND EXECUTIVE SUMMARY

- Participants from the Scientific Advisory Board (including Chair, Deputy Chair) and the Max-Planck-Gesellschaft; extended evaluation: Rapporteurs
- Summary of the main findings and recommendations; comment on the Institute's response to recommendations (optional)
- Disclosure of potential conflicts of interest and measures taken (if applicable)
- Recommendations, if any, for the organization of the next meeting or for the evaluation process as such

STANDING OF THE INSTITUTE

- Profile and visibility, scientific highlights
- Ideas and fields with high development potential
- Quality and effectiveness of scientific cooperation
- Visibility and profile of the graduate programmes

CONDITIONS FOR RESEARCH

- Staff, resources, equipment and facilities
- Management and governance aspects
- Promotion of junior researchers: structures and support, career paths
- Diversity and equal opportunities

INSTITUTE-SPECIFIC RECOMMENDATIONS FOR FURTHER DEVELOPMENT

REPORTS ON THE INDIVIDUAL DEPARTMENTS, WORK AREAS AND GROUPS

- National and international standing; research programme and research planning, scientific performance
- Quality and effectiveness of research collaborations; transfer of knowledge
- Leadership and cooperation
- Recommendations

Annex: Agenda of the on-site meeting

G Overview of functions and tasks

SCIENTIFIC ADVISORY BOARD MEMBERS

- evaluate the Institute and its Departments, Research Areas, and Groups
- advise primarily the President of the Max-Planck-Gesellschaft and the Institute on development perspectives
- can suggest members for the Scientific Advisory Board to the Vice President during or after a board meeting

CHAIRPERSON OF THE SCIENTIFIC ADVISORY BOARD

- receives the draft of the agenda for the Scientific Advisory Board meeting and can request changes on behalf of the board's members
- chairs the meeting, selects a deputy from among the members of the board in consultation with the Vice President and determines the responsibilities for the evaluation in consultation with the members of the board
- if necessary decides on site in consultation with the Vice President on measures to avoid conflicts of interest
- is responsible for submitting the report of the Scientific Advisory Board to the President of the Max-Planck-Gesellschaft within two months of the meeting
- is a member of the Research Field Commission and can be invited to the meeting of the Section's Perspectives Commission (extended evaluation)

DEPUTY CHAIRPERSON OF THE SCIENTIFIC ADVISORY BOARD

- supports the Chairperson
- acts as a deputy to the Chairperson, if necessary, in particular in preparing and submitting the report of the Scientific Advisory Board and at the meeting of the Research Field Commission and, possibly, the Section's Perspectives Commission (extended evaluation)

RAPPORTEURS (EXTENDED EVALUATION)

- attend the extended evaluations of the Institutes of a Research Field
- assess and make recommendations on the evaluation procedure, on the structure and future perspectives of the Research Field and on topics of general strategic importance
- are members of the Research Field Commission and can be invited to the meeting of the Section's Perspectives Commission

PRESIDENT OF THE MAX-PLANCK-GESELLSCHAFT

- appoints upon suggestion of the Vice President, the Institute or the Scientific Advisory Board the members of the Scientific Advisory Board and the Chairperson, may appoint additional members and may suspend membership or terminate it prematurely
- decides on the evaluation cycle after consultation with the responsible Vice President and can initiate evaluations outside the usual cycle
- may participate in the Scientific Advisory Board's institute visit and joins at extended evaluations the concluding discussion between Scientific Advisory Board and Vice President
- forwards the report of the Scientific Advisory Board to the Institute's Board of Directors via the Managing Director with the request for a statement and forwards it to the Chairperson of the Scientific Advisory Board
- appoints the Rapporteurs for extended evaluations in consultation with the responsible Vice President
- participates as a guest in the meeting of the Research Field Commission (extended evaluation)

VICE PRESIDENT OF THE RESPECTIVE SECTION

- submits suggestions for members of the Scientific Advisory Board to the President and, after consultation with the Institute, a proposal for the Chairperson
- receives the draft agenda from the Managing Director for approval; is involved in the selection of the Deputy Chair by the Chair at the beginning of the meeting
- participates in selected agenda items of the on-site visit and takes over the briefing and debriefing of the Scientific Advisory Board
- organizes the appointment and briefing of Rapporteurs and is in charge of preparing, chairing and following up on the meeting of the Research Field Commission (extended evaluation)
- reports on the results of an evaluation to the President and presents the results of extended evaluations to the Senate

SECTION CHAIR (EXTENDED EVALUATION)

- is a member of the Research Field Commissions of the respective Section
- can invite participants of the Research Field Commission to the meeting of the Section's Perspectives Commission

MANAGING DIRECTOR OF THE INSTITUTE

- submits the Institute's proposals for the Scientific Advisory Board members and possibly the Chair to the Vice President and submits the Institute's statement on proposals that do not come from the Institute
- drafts the agenda of the board meeting in consultation with the Administrative Headquarters, the Vice President, and the Chairperson
- organizes the preparation of the Status Report and sends out meeting invitations and relevant documents in due time
- receives the report of the Scientific Advisory Board from the President and organizes the statement of the Institute's Board of Directors on the report
- takes care that those who have been evaluated individually receive at least the excerpt of the report that concerns them and informs the staff of the Institute in a general way

SCIENTISTS TO BE EVALUATED INDIVIDUALLY

- are involved in the preparation of the proposals for members of the Scientific Advisory Board and name issues that could cause concern of bias
- prepare the part concerning them for the Status Report of the Institute and present their work to the Scientific Advisory Board

SECRETARY GENERAL OF THE MAX-PLANCK-GESELLSCHAFT

- may participate in the Scientific Advisory Board's institute visit
- may attend meetings of the Research Field Commissions as a guest (extended evaluation)

ADMINISTRATIVE HEADQUARTERS *(Institute Liaison Managers, Scientific Assistants to the Vice Presidents, Unit responsible for Scientific Advisory Boards)*

- support in the appointment of members of the Scientific Advisory Boards and of Rapporteurs and in the preparation, implementation and follow-up of the meetings of the Scientific Advisory Board and Research Field Commission and, depending on their responsibilities, can participate as guests

The present 5th, revised version of the
"Rules for Scientific Advisory Boards and Guidelines for Evaluation"
(ReF-Eval) was adopted by the Senate of the Max-Planck-Gesellschaft
on 17 March 2023.

Max-Planck-Gesellschaft zur Förderung der Wissenschaften e.V.
Generalverwaltung, Hofgartenstraße 8, 80539 München
Phone: +49 (0)89 2108–0, Email: sab@mpg.de
www.mpg.de