Minutes of the C&CC Meeting — 2-3 October 2019

Day 1 – 2 October 2019 37 Caledonian Road, London, N1 9BU; Seminar 1-3, Institute of Physics, London, UK 9:00 – 17:00

In Attendance:

1	Michel Spiro	President-Designate
2	Bruce McKellar	Past President
3	Rudzani Nemutudi	Associate Secretary General
4	Kwek Leong Chuan	Deputy Secretary General
5	Wang Enge	Vice-President at Large (Finance)
6	Monica Pepe-Altarelli	Vice-President at Large (Centenary)
7	Silvina Ponce Dawson	Vice-President at Large (Gender Champion)
8	Nithaya Chetty	Vice-President at Large (New Members)
9	Vitaly Kveder	Vice-President at Large (Outreach)
10	Peter Mohr	Chair (C2)
11	Rahul Pandit	Chair & Vice-President from commission chairs (C3)
12	Sunil Gupta	Chair (C4)
13	William P Halperin	Chair (C5)
14	Ramin Golestanian	Chair (C6)
15	Rolf Haug	Chair & Vice-President from commission chairs (C8)
16	Burkard Hillebrands	Chair (C9)
17	Laura H Greene	Chair & Vice-President from commission chairs (C10)
18	Heidi Schellman	Chair (C11)
19	Claes Fahlander	Chair & Vice-President from commission chairs (C12)
20	Sekazi Mtingwa	Chair (C13)
21	Roberto Nardi	Chair & Vice-President from commission chairs (C14)
22	Roberto Rivarola	Chair (C15)
23	Minh Quang Tran	Chair (C16)
24	Tsuneyuki (John) Ozaki	Chair (C17)
25	Bruno Nachtergaele	Chair (C18)
26	Gerry Gilmore	Chair (C19)
27	David P Landau	Chair (C20)
28	Roberta Ramponi	President (AC1)
29	Beverly Berger	Secretary (AC2)
30	Michael Taroudakis	President (AC3)
31	John Damilakis	President (AC4)
32	Yungku Bang	Observer representing APCTP
33	K S Narayan	Chair (WG16)
34	Gillian Butcher	Chair (WG5)
35	Jens Vigen	Chair (WG9)
36	Sun Han	IUPAP
37	Maitri Bobba	IUPAP

^{**} As prescribed by the Statutes the word "Council" is used as a shorthand way of referring to "Executive Council"

The C&CC opened with formal introductions and welcome messages. On behalf of the host, Paul Hardakar, the Chief Executive Officer for the Institute of Physics (IOP), UK welcomed all to the new

IOP building. He also introduced the deputy chief executive officer – Rachel, with the responsibility of International programs and strategy. He shared that the IOP has a long-standing relationship with IUPAP that dates back to the beginning of the Union. He highlighted that the IOP is the national physical society for 2 countries – UK and Ireland, with an international presence. Its 5 year strategy focuses on the international theme of encouraging physics and physics education in UK, Ireland and worldwide.

In the absence, of the President of IUPAP, Kennedy Reed, Past-President, Bruce McKellar read out a message sent in by the President (Annex 1). He also mentioned all the contributions made by Kennedy to IUPAP over his 17 years with the Union.

As per the statutes, if the President is unable to serve, the President-designate will take over as the President of the Union. Bruce, handed the floor to the President, Michel Spiro.

Michel thanked Bruce and wished Kennedy and his wife a fast and full recovery. Sekazi (C13 Chair) also shared his concern for Kennedy and asked if the Council would find other means of involving Kennedy in IUPAP work, even as an associate member of C13, rather than losing him completely. The suggestion was welcomed by Michel and said that it would be discussed in the course of the meeting. David (C20) asked for the council to draft a resolution to recognise Kennedy's extraordinary contributions to IUPAP. Michel confirmed that this will be done when the formal meeting starts.

Michel also thanked Paul and IOP for hosting the meeting in London. He wished to encourage a stronger relationship between IOP and IUPAP. He gave a brief introduction on IUPAP. Then Paul spoke on the physics in industry in the UK and Ireland.

Paul gave a brief background on the industrial sector in UK and Ireland, with some related statistics (Gross Value Add) and how the sector is changing. He highlighted the fastest growing areas to be; Quantum and photonics - sensors and imaging, high-value manufacturing, compound semiconductor renewables, new materials, satellite platforms and applications, medical physics, bio physics – neurology and cancer. He also listed the programs/clusters that IOP is running to support this sector. They include: Business Advisory Group, Business, Innovation and Growth Group, Physics Insights and Policy programme, Annual Business Conference, Briefings for start-ups, Business Awards, Technician and Apprenticeship Awards and Network of Incubator Space.

K S Narayan, the newly appointed chair for the working group for industry provided an outline of creating a platform to connect academia to industry. He defined industrial physics and drew attention to the fact that connecting physics and Industry not only builds synergy but allows the industry to be nimble and well optimised all the time.

- Laura Greene: suggested to look at IUPAC model of interaction and partnership with industry
- Minh Quang Tran: Include Plasma physics as a component to WG as it is an important contributor to Industry
- Burkard Hillbrand: Leverage on the connections that C9 has with industry to futher collaborations

■ TEA BREAK

1. Welcome by President

Michel opened the meeting asking Bruce to draft a resolution stating the resignation of Kennedy and also to append his contributions to that resolution when circulated.

2. Introduction of Members

A PowerPoint presentation of all the members was shown with details of their affiliation, areas of study/research/expertise and their last physics paper written with date published.

3. Agenda

3.1. Approval and Adoption of the Agenda

The present C&CC members approved the Agenda, after adding the following to the AOB item:

- International Year of Sound (IYS) by ICA (AC3)
- · Letter to the President of Brazil

3.2. Apologies

1 Kennedy Reed President

1 Phua Kok Khoo Secretary General

3.3. Ratification of items approved by email since last meeting

No items to be approved.

3.4. Approval of the draft minutes of the previous meeting

The draft of the minutes was approved after making the following changes:

 Dates of the meeting recorded incorrectly: Correct '1-2 October 2018' to '1-2 November 2018' in 3 documents

3.5. Matters arising from the previous minutes

- 3.5.1 Michel referred to the 'to-do list' from the paper 3.5.0 'Report on IUPAP EC Oct 2018' to update all on the pending items that needed to be looked into. They were already added to the agenda for further discussion at the meeting.
- 3.5.2 The last meeting had asked for a proposal for an IUPAP certificate of gratitude and appreciation to be written up. The draft of this proposal was presented (Annex 2). The proposal was approved

4. Council Reports

4.1. Report by President

Michel thanked all the Commission chairs for their nominations for their successors. It was suggested, that a formal succession planning should be put in place for Commissions, with the Vice chair made to work closely with the Chair.

He mentioned that due to the resignation submitted by Kennedy he has suggested to change the structure a little. Since there will be no past-president, he requested for Bruce to continue to be the past-president. He advised that he has consulted the other officers and requested Silvina Ponce Dawson (current Vice-President at large for Gender champion) accept nomination as the president designate and she has accepted. The meeting asked Council to nominate her and appointed her as the Acting President Designate until the GA 2020 which will make the appointments

Rahul commented that Silvina was nominated to be the Chair of C3 and since she has accepted to be the President designate C3 will need to reconsider a new member for the position.

4.2. Secretary General's Report

K K Phua was unable to be at the meeting and hence the Deputy Secretary General, Kwek Leong Chuan presented the report.

4.2.1 Office Location

Since the current agreement with NTU for the IUPAP Secretariat Office in Singapore will end in December 2020 and we have already invested and spent a lot of time and effort and infrastructure, we hope to extend the IUPAP Secretariat Office in Singapore for another three more years basically to be based in NUS with the support from NTU. The office at NUS will also be a good option since NUS is closely aligned to the National Academy of Science in Singapore.

Because these negotiations are ongoing Michel is discussing with CERN the possibility of them hosting the office from 2021 or from 2024.

4.2.3 Newsletter

The September (2019) issue of the newsletter has been published. The secretariat would like to thank all commission chairs for writing various reports. Several Young Scientist Winners have contributed to the last issues. As usual, Maitri has been instrumental in assembling the materials for the newsletter.

4.2.4. Young Scientist Prizes 2018

The IUPAP Young Scientist Prizes have been awarded to the following people:

- International Commission on Optics (AC1): Can Bayram
- · International Commission on General Relativity and Gravitation, ISGRG (AC2): Kento Yagi
- International Commission on Medical Physics (AC4): Kuo Men and Jianrong Dai
- Commission on Statistical Physics (C3): Lucile Savany, Alexandre Solon and Manlio de Domenica
- Commission on Astroparticle physics (C4): Anna Nelles and Siyao Xu
- Commission on Biological Physics (C6): Nikta Fakhri and Knut Drescher
- Commission on Magnetism (C9): Julia Mundy
- Commission on Structure and Dynamics of Condensed Matter (C15): Ming Yi
- Commission on Particles and Fields (C11): Jaroslav Trnka and Heather Gray
- Commission on Nuclear Physics (C12): Or Hen, Chun Shen and Xiaofei Yang
- Commission on Atomic, Molecular and Optical Physics (C15): Andreas Mooser and Christian
- Commission on Plasma Physics (C16): Istvan Cziegler
- Commission on Laser Physics and Photonics (C17): Sergey Kruk, Alireza Marandi and Jinyang Liang
- Commission on Computational Physics (C20): Jesus Carrete Montana

4.2.5. Centenary

The secretariat is working with one of the Vice Presidents at Large, Monica Pepe-Altarelli, to print materials for the 100th centenary. Lionel Seow (World Scientific) has been assigned to help with the work: Mihoko Nojiri, Igle Gledhill and Nithaya Chetty are all currently involved in the team. More people are welcome to join.

4.2.6. IUPAP Video

Maitri has put together a video on IUPAP and has requested for feedback from all commission members to improve the content. This can be used for future publicity at supported conferences and meetings.

5. Revision of Statutes and Bylaws:

Bruce presented this item. The October 2018 meeting has made some suggestions on which the new draft of the statutes and bylaws was drawn up (**Annex 3**). The meeting was requested to review again the new draft and send in their comments and suggestions by the 15th of November 2019 so that it can then be sent out to the IUPAP members for their inputs and the final draft to be drawn up by July 2020. It was decided that the final draft of the documents will be put to the General Assembly 2020 (GA 2020).

Important changes involved:

- Mission: changed to reflect the present situation. It was suggested to put "scientific integrity" rather than "integrity", but I think that integrity encompasses both scientific and personal integrity, and that both are important:
 - "IUPAP carries out this mission by sponsoring international meetings; fostering communications within the physics community, between physicists and other scientists and and between physicists and the general public; encouraging research and education; fostering inclusiveness and diversity in physics; upholding openness, honesty and integrity in the practice, application and promotion of physics; supporting the free circulation of scientists; promoting international agreements on symbols, units and nomenclature; and cooperating with other organizations on disciplinary and interdisciplinary problems."
- Adhering Body: added to improve relationships between IUPAP, the Liaison Committees and physics societies of members
 - "It is suggested that the Liaison Committee have representatives of the appropriate physics societies whether or not they are the adhering body. The Adhering body should advise IUPAP of the members of the Liaison Committee three months before each General Assembly, and when membership is changed."
- Special General Assemblies: expanded to allow for electronic meetings and to restrict the business of the Special General Assembly
 - "The Executive Council will call a Special General Assembly at the request of one-third of the members, or on its own initiative. In either case the Special General Assembly will consider only those matters which are specified when the request is made or the initiative is taken. If the Executive Council so resolves, the Special General Assembly may be conducted electronically, rather than in a physical meeting."
- Treasurer: This introduces the named position of Treasurer, and reduces the number of Vice
 Presidents at Large from five to four to avoid increasing the size of the Executive Council.
 The requirement "At least one of the members shall be from a developing country." has
 been moved to the next section to require a higher level representation from a developing
 country.
 - "The Executive Council is composed of the President, President-Designate, nine Vice Presidents, the Secretary-General, the Associate Secretary-General and the Treasurer; all elected by the General Assembly, plus the immediate Past President."

• **President:** The first sentence, omitting "on a temporary or permanent basis", was a part of §IVE. It has been made a new clause and expended to indicate in detail what is to happen in these circumstances

"If the President is unable to serve on a temporary or permanent basis, the President-Designate shall assume the Presidency. If the President will not resume the Presidency at a later time, the Executive Council will then call for nominations for the vacant position of President-Designate, and shall give notice of a Special General Assembly to elect the new President-Designate, unless notice of a General Assembly has already been given. The Special General Assembly will determine the term of office of the new President and President-Designate."

• **Domicile:** Remove statement if no basis is found, or appropriate arrangements are made. "The legal domicile of the Union shall be Switzerland"

6. Financial Matters

Bruce gave a brief introduction to how our Finances work and the financial statements for the year ending 31 December 2018. He noted that:

- Our budget cycle is over 3 years, and this makes annual snapshots of the situation difficult to interpret
- Comparing the budget with the actual expenses for 2018, it seems that there is a substantial overrun in the 2018 C&CC meetings, spending 88,477 EUR against a budget of 72,000. However about 10,000 of the excess was a result of structural changes in our NTU host, and payments promised by IAS were not honoured with the change in the Director. This was deducted from the amount we paid to NTU for the secretarial expanses, so this overspend is partly recouped by the 2018 underspend on secretarial accounts.
- There was an underspend in 2018 of about 4563 EUR on the ISC GA. It is recommend that this be removed from that line and applied to the IYPT, almost balancing the actual expenses there.
- We have requests for additional commitments in 2020, which is recommended to be included in the budget.
 - A request for 10000 EUR for a continuation of LAAAMP into 2020. This would be matched by IUCr, and is largely to support the very successful FAST teams. I recommend that it be provided
 - We are setting up an initial fund for the IYBSD, and are asking partners to contribute 7000EUR each in 2020 towards this fund. I recommend that we provide our 7000 in 2020.
 - These additions to the budget bring us to a triennial budget deficit of just 10659 EUR. This is covered by the contingency allowance of 21000. Moreover, our 2018 income was almost 60000 more than we budgeted, and it seems likely that we will at least reach our budget income in 2019, so I'm confident that we will not be in a deficit situation at the end of 2023, if you accept my recommendations.

The meeting accepted all the recommendations made, accepted the audited financial statement for 2018 and approved the 2020 budget.

■ LUNCH BREAK & OBSERVER MEETING (Annex 4)

7. Member Matters

Nithaya (VPL for New Members) began with a decadal strategy, for attracting new members and retaining old members, that was presented at previous C&CC meeting

• Forms basis of agenda for New Members portfolio

- Various action items are continuously being acted upon
- A Memorandum of Understanding template has been drafted

He informed the meeting that there are currently 56 members of the Union. Approximately 76.79% (43 members) are considered to be very secure, 7.14% (4 members) moderately secure and 16.07% (9 members) precarious in the membership of the Union, the latter being based on on-going challenges or perceptions of challenges with securing the necessary funds for retaining membership. Over the past decade, 14 members entered the Union and subsequently 5 of these members are precarious and 3 of these members exited the Union following due process.

He listed the new members (subject to the approval of the GA2020) as follows:

- Jordan joined in July 2018, MoU needs to be signed
- Egypt MoU was signed in March 2019

 Michel to visit in December for high-level discussions on Egypt's re-admission
- Uruguay MoU was signed in April 2019 Recommend visit by President
- Bulgaria MoU will be signed in December 2019
 Michel to visit in December for signing of MoU

The on-going engagements include:

- Ethiopia working with EPSNA and EPS
- Pakistan challenges
 - Joined in 1951, re-admitted in 2017
 - Adhering body to the IUPAP is the National Center of Physics (NCP)
 - Liaison has been Prof Anisa Qamar from the Univ of Peshawar
- Various other countries
 Still awaiting feedback from some C&CC members
- Engagements though from C13, C14, WG5
- All commission chairs have been requested to help lead membership initiatives

He suggested that for IUPAP to work toward a step-increase in the number of member nations, there needs to be a sustained publicity and communication effort about the work of the IUPAP, not only to member countries but also to non-member countries. He suggested some areas that could be improved to encourage the way forward:

- There is a need for strong administrative support
- Face-to-face meetings, signing of MoU important to deepen commitment
 - Scientific diplomacy
 - Maintain apolitical stance
- New members should be afforded the opportunity to nominate members to commissions, working groups
 - Important to demonstrate immediate return on investments
- Extensively market and publicize the Union
 - Especially to non-member countries
 - Involve non-member physicists in affairs of the Union (potential champions). This is possible if accurate information on, what the benefits for individual membership are can be communicated to give the local perspective.
 - To give a global perspective, we should be able to answer, why does IUPAP wish to expand its membership.
- IUPAP100 is an important opportunity to recruit new members
- IYBSD critically important for building physics bridges between the developed world and the developing world

- Developing world important recruiting ground for new members
- Involve more young people in the affairs of the Union
- Our future depends on it

He concluded, that in order for IUPAP to make a step increase in its membership, we need to better understand the circumstances that science finds itself in the 21st century and recognize the new opportunities for physics. We also need to better articulate how IUPAP can be the lead organisation for addressing these challenges. He emphasized that precise and timely communication is key to success.

- Beverly suggested that IUPAP should reach out, boost and help troubled physics societies of members countries that don't become members, default and discontinue as members.
- Monica asked if there were any concrete suggestions and actions to follow to encourage new members. Nithaya answered that at the moment it is purely opportunistic and it is important to reiterate the value of being a member.
- Sekazi said a good avenue of publicity would be through the ministers and guests of honor that are invited to the conferences.
- Michel said to encourage IUPAP visibility through joint-activities.
- Ramin suggested to ask top-of-the-list to use their development funds to help less funded nations to become members by paying for them.
- Rahul said a good point of references would be the World Academy of Science's network in the developing world.

8. YSP candidates in interdisciplinary fields

It has been suggested that a YSP prize be given to those young scientists working in interdisciplinary fields. It is important to be able to assess why this is being given and how appropriate it is. A report on the proposal will be submitted to the C&CC prior to the GA2020

9. Working Group Matters

9.1. Reports

Only 6 reports were received out of 11 Working Groups. All submitted reports were considered read.

9.1.1. WG2 – Communication in Physics

Jens Vigen, Chair of WG2 gave a brief introduction on the revival of WG2. He confirmed the new members of the working group to be:

- · Michael Thoennessen, APS Editor in Chief
 - Replacing Daniel T. Kulp ("Placeholder" for ex-chair Gene Sprouse)
- Mitsuaki Nozaki, KEK International Office
- Li Lu (tmp., new election Sep.), Chinese Physical Society
- Xavier Bouju, French Physical Society
- Jens Vigen, CERN (Chair)

He also mentioned that he received suggestions for replacements of members (Enrique Canessa, Sergio M Rezende and Nicola Gulley) who have stepped down following change of functions. He outlined the roadmap for WG2 up to the GA2020; Prepare an updated mandate (Q4-19), Reestablish the full group (Q4-19), Study the "open" landscape (Q1-20), Work on set of recommendations (Q2-20) and Supply recommendations to C&CC (Q3-20).

He spoke about SCOAP³, which has published open access articles since 2014. Though this model is HEP-specific, he explained the situation outside of HEP since the SCOAP model does not fit all. He stressed that publishers (including society publishers) often have strong commercial interest

- typically diagonal opposite of the librarians' interests, while scientists are becoming more and more pro OA (often influenced by their funders). Future perspectives, should take into consideration that:
- We will continue to be "slaves" of the Impact Factor.
- We will publish on arXiv, or something similar, and journals will disappear
- We will reach a paradigm shift in scholarly communication

He highlighted the Plan S which is not funded by many institutes but the most are aware of it. He listed the principle of Plan S to be:

"With effect from 2021, all scholarly publications on the results from research funded by public or private grants provided by national, regional and international research councils and funding bodies, must be published in Open Access Journals, on Open Access Platforms, or made immediately available through Open Access Repositories without embargo." (https://www.coalition-s.org/principles-and-implementation)

He touched on 'open science' to an accelerating concept which is potentially hampered by national interests preventing general access to research, since it is mostly driven by funders and their data preservation plans. There is a lack of capacity for data curation and no appropriate responsibility as to who will run the open-data repositories while maintaining science credibility.

In conclusion, he questioned what position IUPAP shall take to 'open'? He emphasized that:

- IUPAP must defend physicists' right to be part of "open"
- There is no question that technology leads to "open"
 - The days of the toll barriers are passed (Sci-Hub Russian website allows access to all)
 - Not publishing the data/software will in the future be as unthinkable as not publishing the article today
- WG2 must advise on the optimal way to "open"
 - Allow for different routes
 - Avoid global divide
- Due consideration is to be given to distinct parst of "open", such as:
 - open access,
 - open science,
 - and maybe open innovation (less sure if this falls under WG2—different people/skills)

Laura highlighted the large economic implications of open access and that Plan S has a lot of complications. Beverly mentioned that the costs involved should be recognised. Vitaly suggested that an interactive discussion on open access could be explored via the newsletter. David said that it is most important that the costs of open access for small groups with small investigator grants is very high and it compromises other more important issues that need to be covered. So, it is essential to have quality of journals and good reviewers. It was suggested that Jens submit an article to the newsletter to start a conversation.

9.1.2. WG5 - Women in Physics

Gillian Butcher, chair of WG5, highlighted the travel grants that have been given out through IUPAP funding which has significantly helped women's lives and encouraged them to more success.

She focussed on the Global survey of Physicists that began in 2012. It was sent to men and women and in 8 languages with a total of 15,000 respondents for physics from 130 countries were received.

The 3 tasks involving the survey, publications and the follow-up with the database for good practices aims to find the issues for the gender gap. For this survey out of the 30,500 respondents for all sciences, only 25.8% were from those in physics. The data presented to IUPAC was for chemistry, physics and biology. The preliminary data released to project members was not cleaned or checked. She gave a glimpse of the questions asked for physics and highlighted the similarity in gender responses. The same was for chemistry but a bit more difference in biology.

Over the 7 years very little seemed to have changed for the women as compared to the men. The final project meeting will be held in November 2019 where discussions on the tasks and analysis will be done. The final report is to be distributed in 2020.

Silvina added more analysis details of the survey and showed that not much has changed over the years. She also touched on the database of good practices mentioning that it is classified in terms of 8 dimensions. The main issue being that the initiatives are only in English. IMU will host the database and asked that IUPAP should point to this site from the home page. She also reiterated the November 6th Wikipedia profile hackathon.

10. ISC Matters

10.1. IYBSD

Michel updated the meeting that the proposal was submitted to the UNESCO executive board by Jordan. Nigeria, Palestine, Russia and Vietnam were supporting delegations. He highlighted that the project is not targeted on physics and so has no reference to geography and any particular field of science. It also included the social sciences.

The preparatory meeting of the UNESCO October Executive Board was held at UNESCO HQ. Jordan made a declaration (Annex 5) which was unanimously and warmly approved. The preparatory group recommended approval of the draft resolution on the proclamation of an International Year of Basic Sciences for Development in 2022 by the executive board in October without debate. Great thanks are due to the delegations of Jordan, Nigeria, Palestine, Federation of Russia, Vietnam.

10.2. IYPT

Bruce updated on IYPT which began formally in January 2019 and ends this December. The opening was in Paris and closing is to be held in Tokyo. It is important to remind everyone that all the elements are made in nuclear reactions and the elements discovered since 1939 are made in contemporary nuclear reactions so a large part of physics is involved and this is often forgotten.

Claes emphasised that the new elements is the business of physicists and asked all to acknowledge the effort put in by Bruce individually for convincing the chemists about it. He also helped to soften the relations between IUPAP and IUPAC. Claes also gave a brief on the exceptional talks at the latest nuclear physics conference in Glasgow.

Bruce requested all to send him any events that they are aware of within their commission or their countries so that he can include them in his presentation at the closing ceremony.

11. Conference Matters

11.1. Sponsorship and Endorsement

Rudzani reiterated the importance of the Chairs of commissions encouraging the organisers to submit the sponsorship applications within the deadline (1st of June of preceding year) and also for the reports after the event via the online forms. He insisted that the harassment and inclusion statements are to be listed along with all conference collateral.

A total of 37 conference applications were received, and the following were the final approved conferences. Maitri emphasised that the conference sponsorships applications should <u>always</u> be submitted online and not via email submissions as they are then not recorded formally.

Comm. No.	Туре	Name	Acronym
C13	D	ADvanced African school & workshop on Multifunctional Ferroic Materials	ASWMFM2020
C2	В	The International Conference on Precision Physics of Simple Atomic Systems	PSAS 2020
C11	В	LHC Physics (LHCP) Conference	LHCP
C4	В	21st International Symposium on Very High Energy Cosmic Ray Interactions	ISVHECRI 2020
C12	В	Advances in Radioactive Isotope Science	ARIS
C11	В	XXIX International Conference on Neutrino Physics and Astrophysics	Neutrino 2020
C16	Α	International Congress on Plasma Physics	ICPP 2020
C13	D	The 6th Biennial African School of Fundamental Physics and Applications	ASP2020
C13	D	6th African School on Electronic Structure Methods and Applications	ASESMA-2020
C18	В	16th International Conference on Integral Methods in Science and Engineering	IMSE 2020
C15	Α	The 27th International Conference on Atomic Physics	ICAP
AC1	В	15th International Conference on X-ray Microscopy	XRM2020
C14	В	World Conference on Physics Education 2020. Subtitle: Innovating physics education: From teacher education to school practices.	
AC4	В	18th Asian Oceanian Congress of Radiology 2020	AOCR
C11	Α	International Conference on High Energy Physics	ICHEP
C20	В	XXXII IUPAP Conference on Computational Physics	CCP 2020
C8	Α	International Conference on Physics of Semiconductors 2020	
C5	А	The 29th International Conference on Low Temperature Physics (LT29)	LT29
C5	В	Frontiers of Low Temperature Physics - (International Conference on Ultralow Temperature Physics 2020)	ULT2020
C2	В	2020 Conference on Precision Electromagnetic Measurements (CPEM 2020), organized jointly with the 2020 NCSL international workshop & symposium	CPEM 2020
C17	В	11th CIRP Conference on Photonic Technologie	LANE 2020
C15	В	20th International Conference on the Physics of Highly Charged Ions	HCI 2020
C9	В	Trends in Magnetism	ICTM
C4	В	9th VLVnT (Very Large Volume neutrino Telescopes)	VLVnT
C13	D	The Third African Synchrotron Light Source Conference (AfLS3): towards a brighter future	AfLS3
AC1	A	The 25th Congress of the International Commission for Optics (ICO-25) and the 16th Conference of International Society on Optics Within Life Sciences (OWLS-16) 16th Nuclei in Cosmos Conference	ICO 25
CIZ	ם	Total Nuclei III Cosmos Comerence	INIC

C11	С	XXV International Baldin Seminar on High Energy Physics Problems	ISHEPP 2020
C12	С	XV Hadron Physics 2020	
C4	С	European Cosmic Ray Symposium	ECRS
C6	С	Crystallographic School in South Africa: Data Collection to Structure Refinement and Beyond	CCP4
C11	С	International Conference on Technology & Instrumentation in Particle Physics	TIPP

Sekazi requested for a list of developing countries to be put up on the webpage so that it will ease off the search for the correct list. He also said a random check on women involvement for the conference be conducted instead of blindly accepting the report information. It was well supported by all.

11.2 Gender Matters

Silvinia discussed the gender distribution from the reports received. Overall there was 20% participation of women in the 2019 conferences. Not much has changed over the years.

- 8 of the commissions do not have female officers, including the commission on Biological Physics and Physics Education, fields where the number of female physicists is not low. It is thus encouraged to increase these numbers.
- In the other 10 commissions, there is one female officer in 9 of them and all officers are female in 1 (C11, Commission on Particles and Fields).

Reports from 5 general conferences in 2019 and 6 in 2018:

- % of female participants: with the exception of one with less than 2% (C10 in Beijing), they are above 13%. Highest percent (conference organized by IUPAP commission not specifically on women in physics): 47% (C14 in Budapest). Then, one Regional Conference on Women in Physics in Kathmandu (82%) and a conference organized by AC4 (38.5%);
- % of female invited speakers: between 19.4% and 25% in 2018 with the exception of the C10 conference held in Beijing (9.4%); between 25 and 40% in 2019 + regional conference on women in physics (82%).

Silvina also described the Waterloo charter, which is a declaration of principles on inclusivity in physics by providing guidelines to advance towards a more inclusive practice. The final draft of this document will be available on the working group web page and emailed to all the C&CC members. It will then be submitted to the GA2020 for final approval.

11.3 Visa Matters

Quang highlighted that when he was in charge of ASEPS (joint conference of Asia and EPS), it was held in Borneo and it was discovered that Israeli participants couldn't apply for a visa to attend the conference in Malaysia. Due to this issue, EPS cancelled the event, as it does not support their policy of free exchange of scientists.

Rivarola also brought up a similar issue with an Afghanistan citizen who had to attend a conference in the USA.

Bruce said that since this is becoming a more of a problem. For IUPAP applications, organisers are asked to ensure visa approvals for attendance. In some cases in the past the conference was moved to more accommodating countries.

The meeting asked that IUPAP should find a way to tackle this issue.

12. Newsletter

No issue with the newsletter other than to increase circulation as far as possible.

The meeting was adjourned for the day at 5:00PM

Day 2 – 3 October 2019 37 Caledonian Road, London, N1 9BU; Seminar 1-3, Institute of Physics, London, UK 9:00 – 17:00

13. Review of Day 1

It was agreed that the conferences to be funded should be approved first and then the allocation of financial support done, to fit within the agreed budget. The list of approved conferences presented yesterday was endorsed. There are 6 A, 17 B, 6 C and 4 D conferences – a total of 33 conferences. With a budget of EUR 223,000 it was agreed that Type A will be awarded EUR 12,000, Type B – EUR 7,000 and Type D – EUR 7,500 leaving an unspent balance of EUR 2000.

- It was suggested that non-member countries should also receive e-copies of the newsletter for wider circulation.

The more detailed review was done at the end of the day.

14. Commission Matters and Affiliate Commission Matters

- **14.1. Reports:** All commission and affiliated commissions submitted their reports, which were taken as read.
- 14.1.1. C13 Sekazi informed that the next C13 medal for outstanding contributions to the enhancement of physics in developing countries is recommended to be presented to Professor Paul Woafo. He will receive it at the GA2020, similar to the last one. This was endorsed
 - There will also be meeting with IOP to encourage activities in Africa from IOP.
- 14.1.2. C4 Sunil mentioned that 25 participants were women and about 43% of the speakers were also women at the recent Conference on Cosmic Ray Physics, which was a record number. The 2 major awards were won by women, along with the poster prizes. Unfortunately, the Chinese and Russian participants could not attend so live streaming was done for their benefit, which helped.

14.2. Free movement of Data:

Heidi was told by an YSP at a C11 conference that as collaborative efforts become multinational, access to shared data (to which scientists have earned intellectual rights) has become just as difficult and important as physical access to research facilities. Most projects have apparatus in many countries, and the multinational distribution of the equipment is creating issues for those who are unable to get visas and are also unable to get approval to get an account for unclassified laboratories without a delay of months. This results in data repositories which were freely accessible are now restricted and some experimentalists are now unable toaccess their own data. As we become more electronically connected, she asked if IUPAP would could a statement (Annex 6) on free access/movement of data, not necessarily an open-data statement but one aligned to facilitate international collaboration. She asked for inputs from all participants.

Laura, emphasised that we should make a statement but do it with vigilance. Bruce said that we should communicate any statement to ISC since our statement on free movement of

scientists was based on their statement. It is important also to include other Unions in this discussion. A resolution is to be drafted to be submitted to GA

Sunil asked if we should do something more radical than just releasing a statement.

Michel advised that a resolution will be drafted and we wil inform ISC and also to IAU hoping for their support.

14.3. Introduction to Commission Chair

Heidi drafted an informal introductory notes for new commission chairs to make the transition of the commission into a new term to be seamless. (Annex 7).

It is requested of all current chairs to inform the incoming chairs of the notes. They will also be listed in the nominations procedures. Bruce suggested to get the new nominated chairs to attend the GA as part of the delegation of their member country.

14.4. Approval of AC2 members

Beverly put up a formal request to the meeting to approve the recommendations of the IUPAP representatives to AC2. There is a committee of 24 elected representative and 4 appointed representatives, representing IUPAP over a staggered 6 year term. When an international meeting is held – 8 members of the commission and 2 IUPAP officers who will rotate office. Recommendations are chosen based on gender balance and geographical distribution. Out of the 8, 4 were women.

AC2 nominated Rong-Gen Cai, Chinese Academy of Sciences (China) and José Antonio Font, University of Valencia (Spain) as the IUPAP representatives.

The meeting recommended that council approve the recommendations as presented.

15. GA 2020 Matters

Bruce mentioned that the nomination committee usually meets prior to the GA to discuss the nominations and come up with the final slates. For 2020 it was suggested that the nomination committee (officers) meet prior to the C&CC but also extend the C&CC by a day for the nominations to be discussed with all, before formally presenting them to the Council, for their recommendation to the the GA.

The current dates were from $9^{th} - 14^{th}$ of October 2020 but it was suggested to have it as follows: 8^{th} Oct – Officers Meeting

 $9^{th},\ 10^{th}$ and 11^{th} Oct – C&CC meeting, the first day being a discussion of Commission recommendations for membership

12th, 13th and 14th Oct – GA meeting

Enge presented the proposal sent in by the organising committee. Concerns on the internet access were raised but reassured that it will not be a concern. The location of the meeting will be close to both Peking University and the Tsinghua University. Lab tours will be organised if time permits.

Afternote: The Beijing organisers have approved the dates of the 8^{th} – 14^{th} of October 2020.

16. Nomination Procedures

The nominations will be made online and the dates for these were suggested.

Bruce advised that nominations for the members for the commissions is a tedious process and it was recommended last year that it should be discussed with all in the C&CC so as to minimise contentious discussions at the GA. He also urged the chairs to let the nomination committee know confidentially of any eligible existing members who are not recommended for positions on the new commission because of inactivity, so that they are not considered when variations need to be done.

Another issue was that a single country having too many chairs was not appreciated last GA, so Bruce suggested that nominations should be adjusted accordingly or be able to convince the GA of the nominations.

Nithaya stressed that since continuity for commissions is being established it is imperative that the Vice-Presidents at large should also have such a process in place so that the work is continuous.

Bruce recommended that all the nominations be done 1 year in advance informally and distribution be discussed with the C&CC before GA presentation. It was approved by the meeting. He also suggested that since it is approved it should be sent to the Liaison committees for their updates and involvement.

Suggested dates relevant to the General Assembly Process for 2020 GA (12-14 Oct 2020)

Item	From ByLaws	Statutory Date	Agreed Date
Notice of GA*	6 months	12 April	12 March 2020
Agenda	3 months	12 July	12 July 2020
Call for Nominations to LC	6 months	12 April	12 March 2020
Call for Nominations to Comm	6 months	12 April	12 March 2020
Close nominations by LC	4 months	12 June	12 June 2020
Close Nominations by Comm	6 weeks	30 August	30 August 2020
Proposals for Resolutions to close	not specified but leave time to send out agenda as above	_	18 June 2020
Proposals for Agenda Items to close	not specified but leave time to send out agenda as above	_	18 June 2020

■ TEA BREAK

17. IUPAP Centenary

Monica began with a recap of the initial ideas mooted for the centenary. It was to split the work around the 4 main initiatives:

a) The Centennial Symposium

Venue, timing and format

- In Geneva (CERN?) in the fall of 2022 as one of the initiatives for the International Year of Basic Sciences for Developments (IYBSD)
- Our resources are modest, so it is seems important to have the support from a large institution See, e.g., what the IAU (International Astronomical Union) and the IUPAC are doing to celebrate their centenary this year:
 - https://www.iau-100.org; https://iupac.org/100/ (PS: Our web pages would benefit from a general 'relooking')
- CERN has recently launched the Science Gateway, a new futuristic building designed by world-renowned architect Renzo Piano, entirely funded through external donations. Science Gateway will be a centre for scientific education and outreach targeting the general public of all ages.
- The idea is to inaugurate it with the IUPAP celebrations as well as with events related to the IYBSD. This would greatly amplify the impact of our event. At the same time, having such a target is also useful for CERN.
- Idea extensively discussed with CERN management
- A fall-back solution could be to organize a symbolic event at the Palais de Nations and then use other facilities such as the Geneva's International Conference Center (CICG).

Possible themes (linking with the IYBSD):

- Physics as a building block of basic sciences
- Physics as a motor for innovaton, technology & economic development
- Education (active learning of physics) for boys and girls, e.g. invite the commissions to prepare some small "portable" experiments
- Physics and multicultural dialogue
- Physics and global challenges
- Promoting gender equality in science
- Join forces with the Wright Science Colloquia, held every two years at the University of Geneva, see https://colloque.ch/en/introduction-2/
- Timing would match and they have funding and a well run organization with public talks (one per evening over a week; 2018's theme was Gravity), an event for the younger public and Sound & light show.
- Met with the organisers of the Colloquia and they are interested in joining forces

b) Publicity material on the Centenary (&IUPAP)

How can we make the Centenary (and IUPAP!) more visible?

- Worked on a presentation and logo & posters, with help of a professional graphic designer from World Scientific
- All publicity material collected in a common dropbox depository
- Proposal of the logo was presented
- Poster ideas
- Prepare dedicated leaflets (one page) with mission statement and facts & figures from each commission and WGs on one side and general IUPAP info on the other.

Goals

- To prepare a little booklet for the Centenary. Still quite a few holes and very mixed content. Work necessary to fill the gaps and have more homogeneous content and look & feel.
- To distribute leaflets to participants of IUPAP-sponsored conferences (~35 per year) together with conference material.

Proposal:

We provide the "back page" with the general IUPAP info and you fill in the front page with relevant facts about your commission/wg relevant for your conference. Successful example from C14!

• Leaflets will be distributed to all chairs and conference organisers to add to their information packs for all IUPAP supported conferences and events. The commissions can use the other side of the leaflet to highlight their commission works if they want.

c) History of IUPAP

- The Idea is to profit from the occasion to make order in the IUPAP archives and digitize them.
- A lot of very interesting material already available on the common dropbox repository. This
 material should be catalogued and some of it could be posted on the web as "stories". Very
 interesting book on IUPAP "Physics 50 years later" (Article on "The unity of physics" by
 E.Amaldi) Ramin suggested that he could help with this issue and asked Monica to liaise
 with him on that.
- The idea of publishing a "Centenary book" with the help of a professional historian is at the moment "dormant". An interested and qualified person identified (Research Scholar at the Max Planck Institute for the History of Science in Berlin), however he failed to obtain a grant to cover his salary. He has now moved on to other activities and is not available.

d) Satellite events elsewhere in the world

- Use IUPAP-sponsored conferences as vehicles to celebrate the Centenary and the IYBSD,
 e.g. having dedicated plenary talks (for free). Could this be made a condition for sponsior
 ship in the centenary year?
- 'Local' initiatives are encouraged. IUPAP will act as an 'umbrella' for these various initiatives, however, things will not happen, unless YOU promote them!
- Note that the 2023 General Assembly, will be held in Paris, 100 year after the first General Assembly (1923 – Paris)

Suggestions:

- Publicity should be the main focus at this stage and it can be done through posters, social media and direct calls to prospective organisers
- It was suggested that all IUPAP supported conferences held in 2022 be called 'Centenary Conferences'
- It was suggested to use the logo on all publicity materials of physics societies that are liaisons to IUPAP.
- Conduct webinars and tele-conferences worldwide to publicise the events
- Encourage futuristic articles for the centenary so that it is useable for young researchers

18. Relations with other Unions

18.1. IUPAC

Bruce mentioned that the relations with IUPAC are developing well and we are collaborating more than before. He thanked everyone and asked to have good relations with chemists in their countries. He reminded everyone to please send in any comments that he can talk about at the IYPT closing in Tokyo.

The we have now developed good relations regarding the authentication of discoveries of new elements and the naming of them. Soft Matter is a good opportunity to encourage collaboration. It was suggested that it would be good to invite the IUPAC to the GA2020. Enge said he will try to invite the President (resident of Beijing).

18.2. IAPS

IUPAP has collaborated with them in prior meetings however they could not come to this meeting. Perhaps it is due to the costs involved in travelling to the meeting. Their participation will be good for

Centenary and it is recommended that we invite them to the GA2020 to discuss joint activities that can be done. We should encourage them to become and affiliated commission and eventually a commission of IUPAP.

Nithaya highlighted that it would be good to involve our students and younger staff as they may champion their fields more strongly than the senior staff. He asked if we can get them into commissions as members. Bruce mentioned that it was not taken well at the last GA when a younger person was nominated as a member to the commission, and this mind-set needs to be changed. He also highlighted that the younger physicists don't have as much time to get involved in any volunteer activities and this needs to be addressed too.

Silvina suggested in sending a questionnaire to them asking 'what and how IUPAP can do to involve younger people'.

18.3. *ISC regional offices*

Rudzani updated that the African regional office is still being hosted by South Africa. They are focussed on 'future Earth' related workshops, but they are also keen on contributing to IYBSD. There is also an issue about who will host the regional office after South Africa, discussions are ongoing. Nigeria is a possibility.

18.4. ICO

Roberta informed that ICO has been applying for the last 4 years to become a separate union however since there was no clear outline on the relationship with IUPAP the matter remains pending. In close collaboration with the Presidents of IUPAP it was decided that an MoU will be drawn up to keep a strong relationship with IUPAP for Optics, photonics and physics, while for other activities related to engineers and material science, they will work with other unions. They will have stronger connections with C17. The MoU will need to be discussed with ISC as well. Work is still in progress.

It was agreed that revisions of the MOU be reviwed by the officers and considered by the Executive Council

C17 chair Tsuneyuki also commented that the commission members are all very positive with the recent collaborations at the joint conference with ICO and encouraged for more such events.

19. AOB

19.1. International Year of Sound

Michael Taroudakis gave a little background first. In 2015 the International Year of Light was celebrated and then it was decided that international days should be celebrated for the important aspects of physics which naturally pointed to the International Year of sound (IYS). A process was started to convince UNESCO and later it was submitted to the UN to celebrate IYS for 2019. But since IYPT is being celebrated in 2019 the project was moved to 2020. Negotiations have started with UNESCO. Though they were positive that we need the process to be supported by other countries in Africa and Asia (developing countries). Without the approval of UNESCO or the countries there will be an unofficial IYS 2020 with partners from affiliate organisations of ICO.

The mission for IYS is to raise the importance of sound for society and the world. To improve the public understanding of the wide application of sound in our daily life and to highlight the importance

of the use and benefits of sound while controlling the unwanted noise. In 2017 UNESCO passed a resolution 39 C/59 on "The Importance of Sound in Today's World: Promoting Best Practices".

An opening will happen on the 31st January 2020 at the Sorbonne University Paris. There will also be a short film on importance of sound, worldwide student competition, outreach activities International Conferences, National Societies-International Organizations and Activities of La Semaine du Son. The website http://sound2020.org provides more information. Michael requested all to inform him if any of the commissions or working groups have events related to sound so that they can showcase the event at their end. He requested for IUPAP endorsement and once approved asked for the logo.

The meeting approved the endorsement.

19.2. Letter to President of Brazil

Roberto Nardi highlighted the state of affairs in Brazil, where students were losing their scholarships and study grants and leaving the country. He also mentioned that the last chair of the Brazilian society of physics Prof Galvao was fired because he voiced his regret on the condition of Brazil in terms of science study and ecological imbalance.

Michel confirmed that the council will review the letter drafted and will seek their approval to write to the Brazilian President to show support to the scientific community irrespective of whether it will impact the final decisions of the government. Rivarola affirmed that writing such a letter will definitely show international solidarity although it will not change any attitudes. The council will also review the letter with the liaison member for his/her agreement to issue such a letter.

Laura stressed to keep the letter completely non-political.

■ LUNCH BREAK

20. Review of the meeting and future procedures

The meeting agreed make the following recommendations to the immediately following meeting of the Executive Council, recognising that it is the Executive Council which can make formal decisions.

- 1. Resolution on the resignation and appreciation document for Kennedy to be approved by him first and then sent to all members and members of commissions and working groups.
- 2. C&CC approved the meritorious service award. Commissions and Working Groups to be invited to submit nominations of potential recipients to the Executive Council by 1 December
- 3. Design certificate for meritorious service
- 4. Explore more joint activities with liaisons especially international ones
- 5. Nominate Silvina Ponce Dawson as President-Designate to the 2020 GA, and appoint her as Acting President Designate until that meeting to help with Executive Council duties.
- 6. Proposals to host the office are expected by the end of the year and will be considered by the Executive Council NUS and CERN
- 7. Suggested modification to the Statutes and Bylaws is to be provided to Bruce before 15 Nov, for inclusion in a revised version to be distributed before Christmas. The target is to distribute an agreed version to Members by 1 February 2020 for feedback to Executive Council by 1 May 2020 and return to Members by 1 July 2020 for consideration and adoption at the 30th General Assembly in October 2020. Consideration to be given to incorporating default succession arrangements for Commissions with the event that the Chair is unable to continue.
- 8. Market and publicise the union to non-member countries.
- 9. Define IUPAP's position on Open Science

- 10. Finalise the membership, mandate and connection with companies for WG16
- 11. Any related activities to IYPT to be provided to Bruce by 15 November
- 12. Conferences approved as listed. For 2021 conferences, clearly define endorsement and reduce ambiguity between endorsement and C-type conferences.
- 13. Distribute newsletter more widely especially to potential new members
- 14. Statement on the free movement of data to be reviewed and circulated. Once approved to seek support of ISC and IAU.
- 15. Introductory notes to incoming Chairs to be updated and distributed before nominations are called
- 16. Link directly the conference application form to world bank website list of developing countries for conference submissions
- 17. It was agreed that revisions of the MOU be reviewed by the officers and considered by the Executive Council
- 18. Distribute nominations procedures to liaisons (1 Feb) for comments and revision before submitting to GA.
- 19. Leaflets to be produced and sent to all chairs and members to encourage them to use at all IUPAP supported activities.
- 20. Look further to produce the centenary book
- 21. 2022-2023 Conferences to be used to publicise the Centenary, and labelled Centenary conferences. Note to Commission Chairs now and in 2020 and in 2021, as 2022 conferences already being decided.
- 22. Encourage commission and members to hold satellite events during the centenary.
- 23. Archive and digitise documents to the website
- 24. Redesign the website to incorporate the centenary
- 25. Hold joint activities with regional physics societies. Also have regular zoom calls to update on activities.
- 26. Invite Presidents of IUPAC, IAPS and ISC to GA 2020
- 27. President to continue discussions with IAPS to establish a formal relationship
- 28. Endorse the IYS and give logo for use
- 29. Review the letter to Brazilian President, consult with liaison and distribute to council for approval then post on website.

21. Physics Highlights

Peter (C2) and Silvina (C3) gave some update on physics findings and conference participation respectively.

C&CC meeting was adjourned at 3:00pm

ANNEX

Annex 1 – Message from President to Council and Commission Chairs

28 September 2019

To the IUPAP Council, Commission Chairs, and Staff:

Re: Resignation as President, IUPAP

Because of family illness, I will not be in London for the C&CC meeting. I have also decided to step down as President of IUPAP because of this illness.

Being part of IUPAP for the past seventeen years has been an honor, and also richly rewarding for me.

I am deeply grateful to Past President Bruce McKellar and President Designate Michel Spiro for their understanding and continuous support during the time that I have been President of IUPAP.

My thanks also to all of you.

Sincerely,

Kennedy Roed

Kennedy Reed

Annex 2 - Proposal for an IUPAP Certificate of gratitude and appreciation

At the request of Council, I provide a proposal regarding such a certificate, for consultation at our October 2019 C&CC meeting.

It is proposed, that IUPAP award a certificate of gratitude and appreciation to those who have given long and meritorious service to the Union, but have not been a President of IUPAP or a Chair of a Commission or working group.

Long service, is defined to be more than 9 years of service. Meritorious service is service recognised by the IUPAP Executive Council as having significantly helped IUPAP to achieve and sustain its mission.

Some explanation

I have excluded those who have been Presidents or Chairs of Commission and Working Groups for two reasons:

- 1. Having held such a position is in itself significant recognition of the persons contribution
- 2. It does not put Council in the conflict of interest situation of voting to award such certificates to its own members

Bruce McKellar

----Annex 3 - Statutes and By-Laws (C&CC paper 5.0.0)

Bob Barber and Wim van Oers spring to mind as potential candidates

Annex 4 - Minutes of the Observer Meeting

Notes of Lunch Meeting on Regional Physical Societies and Centers

Present:

Michel Spiro
Rudzani Nemutudi
Enge Wang
Bruce McKellar
Kwek Leong Chuan
Yunkyu Bang (APCTP)
Minh Quang Tran (EPS)
Peter Mohr (APS)
Laura Greene (APS)
Silvina Ponce Dawson (Argentina)
Paul Hardarkar (IOP)

Bang gives an introduction on the current status of the Asia Pacific Center of Theoretical Physics, APCTP (the Asia Pacific Counterpart of ICTP). Bangs says that there is a lot of similarity between APCTP and IUPAP. APCTP is working a lot on Science Diplomacy and recently the center has admitted three countries in Central Asia, Kazakhstan, Uzbekistan and Kyrgyzstan.

Michel mentions that Science Diplomacy comes under the general heading of Physics and Society.

Laura mentions that it is very important to maintain Science Diplomacy and also mentions about the cases of Iran as well as the relations between USA and USSR in the 50s. Keeping the conversation open for scientists is absolutely important. IUPAP should play an active role.

Enge mentions about the round table between China and APS.

Michel mentions about "sesame" project.

Bang mentions about getting countries in Central Asia to join if possible. Bruce mentions that he has approached some of these countries five years ago and there was interest but then due to financial constraint, the interest fizzles out. APCTP exempt membership fees for these countries.

Laura mentions that diversity is needed to attack a broad range of physics and real world problems.

Paul mentions about the millenium goals and the sustainable development agenda. He wonders if there is a possibility of having a "G20-type" meeting during the IYBSD or centennial celebration or at UN level. Essential to have some high level governmental meetings to solve some of these problems.

Paul mentions about the push for a Light Source in Africa and Bruce and Rudzani mentions atht Sekazi has pushed for it in the past but without significant success.

Paul also mentions that it is important to engage young physicists around the world.

Laura mentions about a proposal to meet on human rights and science but it is rather diffcult to organize.

There is plan for a Zoom meeting.

Annex 5 - Jordan's declaration for IYBSD

Brief Presentation for September 25th preparatory meeting

Chairperson, Dear Colleagues,

I have the honour to introduce item 45 "International Year of Basic Sciences for Development in 2022" along with document 207 EX/45 on behalf of the following countries: Jordan, Nigeria, Palestine, Russia, Viet Nam, Iraq, Portugal, Ghana, Gambia and Kuwait.

The explanatory note and the proposed DR as contained in the aforementioned document is an outcome of fruitful collaboration between the co-sponsoring states and the International Union of Pure and Applied Physics (IUPAP) and several other scientific institutions. The President of the IUPAP Dr. Michel Spiro who spearheaded this effort with his colleague Mr. Luc Allemand is with us today. This initiative enjoys also the support and endorsement of the Chairperson of the Scientific Board of UNESCO's International Basic Sciences Programme (IBSP) Professor Nicole Moreau.

Chairperson, Dear Colleagues,

Basic sciences, such as mathematics, physics, chemistry, life and social sciences, are curiosity-driven sciences which have also fundamental roles in our lives. They enable the necessary means and tools to address global socio-economic and environmental challenges, such as climate change, the water crisis, biodiversity loss, extreme events, and ocean deoxygenation.

Despite this, the crucial role of basic sciences is often poorly appreciated, if at all. Further awareness of the critical function of basic sciences needs to be built amongst relevant stakeholders including policy-makers, business and industry, international organizations, philanthropic foundations, universities, teachers and students, media, and the broader public.

Increased awareness of basic sciences is expected to lead to further opportunities for new discoveries which can improve human well-being within the framework the 2030 Agenda, with its Sustainable Development Goals (SDGs).

What are the expected outcomes of AN INTERNATIONAL YEAR OF BASIC SCIENCES FOR DEVELOPMENT (IYBSD)

The year will be structured around different events addressing, inter alia, the following cross-cutting themes:

- Basic sciences for sustainable development
- Women and basic sciences
- Basic sciences in African, Latin American, Asian and small island developing States
- Youth and basic sciences

The IYBSD will promote inclusive collaboration in Fundamental Research by fostering gender-balanced and geographically diverse teams and networks.

It will also promote capacity-development opportunities as well as formal and informal education activities in the basic sciences. It will organize major conferences and workshops in different parts of the world, and in particular in developing countries.

Why the year 2022?

As the year 2022 marks a number of benchmarks in history of basic sciences like the ones mentioned in the explanatory note, it will be a very good opportunity to promote, basic sciences for peace, education, youth, women and for developing countries. It is also intended to contribute to give a boost to the second part of the sustainable development agenda (2015-2030).

Finally, I hope that this proposal will enjoy the endorsement of the wider membership of UNESCO member states and to recommend to the executive board to endorse it without debate.

Annex 6: Free movement of Data

Draft wording for data movement:

Physics more and more involves international collaborations that share in the construction and operation of common apparatus and analysis of the data that results. Such collaboration is most successful when collaborating scientists have unimpeded access to both the physical apparatus and to the data that has resulted from their efforts. We observe a disturbing trend of restriction of access to facilities, shared data and methods of communication. While nations have legitimate needs to protect their critical facilities and computing systems, they also have a responsibility to find ways to maintain access for international scientific collaborators.

Annex 7: Introductory note to incoming Commission chairs

These are a first draft of informal introductory notes for new commission chairs. It would be nice if IUPAP could correct/expand this to give incoming offices an idea of what will come.

Here are the formal guidelines

http://iupap.org/general-assembly/29th-general-assembly/procedure-for-nominations-of-members-to-commissions-and-executive-council/

What is going to happen:

Over the 3 year term, Commission Chairs should expect to attend several meetings. There will be several IUPAP specific meetings of IUPAP Commission Chairs and in addition, meetings of individual Commissions and possible meetings of Working Groups for which a Commission is the convening body.

The form IUPAP Chairs meetings last 2-3 days and rotate amongst member countries.

IUPAP will generally cover reasonable travel expenses for the IUPAP Commission Chairs meetings but not for travel to the individual Commission meetings unless a formal request for support is made to the organization.

Different Commissions have different methods of carrying out their business. Typical methods are:

- Phone meetings
- Annual meetings at the major conferences for the field
- · Standalone meetings as needed

The expected schedule for formal IUPAP meetings is:

- An IUPAP General Assembly in the Fall previous to the beginning of the Chair's term.
- A special meeting of Commission Chairs in the first Spring of their term for orientation.
- An annual Fall meeting of the Commission Chairs in years 1 and 2 followed by the General Assembly meeting in the Fall of year 3.

Commission Chairs are expected to prepare a formal report of the activities of their Commission for each Fall meeting. National liaison committees may also require a report. A three year report is expected for the General Assembly.

Assuring a smooth transition to the next leadership is important. In most Commissions it is expected but not required, that the Vice Chair or Secretary will be the next Chair. For this reason, the Vice Chair and Secretary (and, if different, the next Chair-Designate) should be included in decisions and correspondence to assure that they are fully aware of the operations of the Commission. The Commission should also be thoughtful in nominating new members and officers to ensure a strong group of future officers.

Each Commission has access to a very small (~1000 EU) annual budget that may be accessed by application to the President and Secretariat. The most common use of these funds is to support the travel of Commission members from developing countries to Commission meetings.

Sample Memorandum of Understanding Template

Memorandum of Understanding

Between

The International Union of Pure and Applied Physics (IUPAP)

and

the adhering body

This Memorandum of Understanding (MOU) sets forth the terms and understanding between the International Union of Pure and Applied Physics (IUPAP) and the adhering body of (country) becoming a member of IUPAP (see attached statutes and bylaws of IUPAP).

Background

This partnership is of profound importance since IUPAP aspires to be as inclusive as possible on a global scale, having many members who contribute to physics, and the adhering body of (country) wishes to be well connected to the international physics community by becoming a member of IUPAP.

Purpose

This signed MOU establishes the first formal relationship between IUPAP and the adhering body of (country), by which (country) becomes a member of IUPAP.

Reporting

Reporting of IUPAP to its members, and engagement by its members with IUPAP, is normally done at the General Assembly (GA), in accordance with the statutes and bylaws. IUPAP will also communicate with members though regular newsletters, through its website (http://iupap.org), and by occasional other electronic means. Communication between the adhering body of (country) and IUPAP may also occur on a bilateral basis at any time.

Liaison Committee

The adhering body of (country) shall appoint an IUPAP-(country) Liaison Committee that shall serve as the interface between the IUPAP and the physics community of (country).

Funding

The (member) has applied for N shares in IUPAP and this application has been approved by the Executive Council of IUPAP. It will be ratified at the next GA. The cost of a share is determined at GAs, and the cost of one share in 20yy is NNNN EUR. IUPAP will invoice (country) for AAAA EUR on yyyy for the membership dues for 20yy. The number of shares can be modified by following the statutes and bylaws.

Duration

This MoU is intended to be a reflection of a long-term commitment between both parties. The adhering body may resign, and the effect will formally take place at the following GA. This MOU is at-will and may be modified by mutual consent of authorized officials from IUPAP and the adhering body. This MOU shall become effective upon signature by the authorized officials from IUPAP and from the adhering body of (country) and will remain in effect until modified or terminated by any one of the partners by mutual consent.

Contact Information

IUPAP
IUPAP representative
President
Address
Telephone
Fax
E-mail

Adhering body of (country)

Adhering body representative Position Address Telephone

Fax E-mail

	_ Date:
(Partner signature)	
(Partner name, organization	, position)
	Date:
(Partner signature)	_

(Partner name, organization, position)