

Radiocommunication Bureau (BR)

Circular	Letter
CR/416	

13 January 2017

To Administrations of Member States of the ITU

Subject: Minutes of the 73rd meeting of the Radio Regulations Board

Pursuant to the provisions of Nos. 13.18 of the Radio Regulations and in accordance with §1.10 of Part C of the Rules of Procedure, please find attached the approved minutes of the 73^{rd} meeting of the Radio Regulations Board (17 – 21 October 2016).

These minutes were approved by the Members of the Radio Regulations Board by electronic means and are available on the RRB pages of the ITU web site.

François Rancy Director

Annex: Minutes of the 73rd meeting of the Radio Regulations Board

Distribution:

- Administrations of Member States of ITU
- Members of the Radio Regulations Board



Annex

Radio Regulations Board Geneva, 17-21 October 2016



INTERNATIONAL TELECOMMUNICATION UNION

Document RRB16-3/12-E 9 November 2016 Original: English

MINUTES*

OF THE

73rd MEETING OF THE RADIO REGULATIONS BOARD

17-21 October 2016

Present: Members, RRB

Ms L. JEANTY, Chairman

Mr I. KHAIROV, Vice-Chairman

Mr M. BESSI, Mr N. BIN HAMMAD, Mr D.Q. HOAN, Mr Y. ITO, Mr S.K. KIBE, Mr S. KOFFI, Mr A. MAGENTA, Mr V. STRELETS, Mr R.L. TERÁN, Ms J.C. WILSON

Executive Secretary, RRB Mr F. RANCY, Director, BR

<u>Précis-Writers</u> Mr T. ELDRIDGE and Ms A. HADEN

Also present:Mr H. ZHAO, ITU Secretary-General
Mr M. MANIEWICZ, Deputy Director, Chief, IAP
Mr Y. HENRI, Chief, SSD
Mr N. VASSILIEV, Chief, TSD
Mr A. MATAS, Head, SSD/SPR
Mr M. SAKAMOTO, Head, SSD/SSC
Mr J. WANG, Head, SSD/SNP
Ms I. GHAZI, Head, TSD/BCD
Mr B. BA, Head, TSD/TPR
Mr K. BOGENS, Acting Head, TSD/FMD
Mr W. IJEH, BR Administrator
Mr D. BOTHA, SGD
Ms K. GOZAL, Administrative Secretary

^{*} The minutes of the meeting reflect the detailed and comprehensive consideration by the members of the Radio Regulations Board of the items that were under consideration on the agenda of the 73rd meeting of the Board. The official decisions of the 73rd meeting of the Radio Regulations Board can be found in Document RRB16-3/11.

Subjects discussed

Documents

1	Opening of the meeting	-
2	Late submissions	-
3	Report by the Director of BR	RRB16-3/3 + Corr.1 + Add.1-4 + Add.2 (Add.1), RRB16-3/4 (Annex 10)
4	Consideration of draft rules of procedure – General comments	CCRR/56, CCRR/57; RRB16-2/3 (Rev.2), RRB16-3/4 + Corr.1
5	Consideration of draft rules of procedure	CCRR/56, CCRR/57; RRB16-3/4 + Corr.1
6	Consideration of draft rules of procedure - List of proposed rules	RRB16-2/3 (Rev.2)
7	Submission by the Administration of Indonesia requesting an extension of the regulatory time-limit to bring back into use the frequency assignments of the PALAPA-C3-K satellite network	RRB16-3/1 + Add.1
8	Submission by the Administration of Papua New Guinea requesting an extension of the regulatory time-limit to bring into use the frequency assignments of the NEW DAWN 21 satellite network at 60°E	RRB16-3/2 + Add.1
9	Submission by the Administration of Israel requesting an extension of the regulatory time-limit to bring into use the AMS-CK-17E satellite network	RRB16-3/6
10	Submission by the Administration of France concerning a request for an extension of the regulatory time-limit for the bringing into use of frequency assignments to the F-SAT-N-E-70.5E satellite network in the 30/20 GHz range	RRB16-3/10
11	Request for a decision by the Radio Regulations Board for cancellation of frequency assignments in the band 3 702- 6 420.5 MHz to the NIGCOMSAT-1R satellite network under No. 13.6 of the Radio Regulations	RRB-16-3/5
12	Submission by the Administration of Papua New Guinea requesting a decision from the Radio Regulations Board to reinstate the Part B and notification filings of the AFRISAT 3W-PKU satellite network	RRB16-3/7
13	Submission by the Administration of Qatar on the examination of the F-SAT-N5 satellite networks (B1FR transmit beam)	RRB16-3/8, RRB16- 3/DELAYED/1-3
14	Submission by the Administration of Luxembourg requesting the revision of the examination of the LUX-30B-G4-19.2E satellite network under Articles 6 and 8 of Appendix 30B	RRB16-3/9
15	Election of the chairman and vice-chairman of the Board for 2017	-
16	Confirmation of the dates of the next meeting and meeting schedule for 2017	-
17	Celebration of the 110th anniversary of the Radio Regulations and ITU World Radiocommunication Seminar 2016	-
18	Approval of the summary of decisions	RRB16-3/11
19	Closure of the meeting	-

1 **Opening of the meeting**

1.1 The **Chairman** opened the meeting at 0900 hours on Monday, 17 October 2016, and welcomed participants to a meeting that faced a very full agenda.

1.2 The **Director** also welcomed the Board members. He wished them every success in a meeting that was to address many important items, including numerous rules of procedure required in support of the new edition of the Radio Regulations, shortly to be published.

1.3 The **Secretary-General**, visiting the meeting briefly, stressed the importance of the Board's work in support of the vital activities of the Radiocommunication Sector, and in helping to resolve both straightforward and extremely difficult issues, while ceaselessly seeking to improve its working methods to enhance its efficiency. The ITU membership greatly appreciated the Board's work as a permanent organ of the Union, as was borne out by the fact that Board member candidacies for the PP-18 elections were already being prepared and discussed. He thanked all the Board members for their valuable contributions and assured them of his full support.

2 Late submissions

2.1 The Board noted that three late submissions (two from the Administration of Qatar and one from the Administration of France) were related to an item on the agenda of the present meeting, and **agreed** that they should be taken up under that item, for information.

2.2 Regarding Document RRB16-3/4, containing the comments received from administrations on the draft rules of procedure before the present meeting, the **Chairman** noted that Algeria's contribution in Annex 10 contained both comments on the draft rules and a request for the Board to issue a favourable finding for Algeria's assignments published in BR IFIC 2798/07.07.2015. Recalling that those assignments had been discussed by the Board at its 72nd meeting, she suggested that Algeria's comments on the draft rules be taken up when the Board addressed the draft rule on the GE06 Agreement (Circular Letter CCRR/56), and that the request for a favourable finding be dealt with separately.

2.3 **Mr Bessi** suggested that Algeria's request for a favourable finding be taken up under the Director's report to the present meeting, which touched upon the decision taken by the Board at its 72nd meeting.

2.4 It was so **agreed**.

3 Report by the Director of BR (Document RRB16-3/3 and Corrigendum 1 and Addenda 1-4 and Addendum 1 to Addendum 2; Annex 10 to Document RRB16-3/4)

3.1 The **Director** introduced his customary report in Document RRB16-3/3.

3.2 **Mr Vassiliev (Chief TSD)**, introducing the sections of the report dealing with terrestrial systems, drew attention to § 4 on harmful interference and, in particular, to § 4.2 dealing with harmful interference to broadcasting stations in the VHF/UHF bands between Italy and its neighbouring countries. Addendum 1 to the report contained a letter from the Administration of Croatia stating that there had been no improvement in the harmful interference situation. Addendum 4 contained an additional communication from the Administration of Croatia, mentioning reports of harmful interference to be sent on a compact disk (which had not yet been received). Addendum 3 contained a letter from the Administration of Slovenia stating that the harmful interference situation remained unchanged and that it awaited the switch-off of television channels. Addendum 2 contained a report of a meeting between the Bureau and the Italian Administration, with an annexed road map of actions by Italy (Addendum 1 to Addendum 2).

3.3 **Mr Strelets** said that the work done by the Italian Administration and Bureau was impressive, and he hoped that the positive momentum would continue.

3.4 The **Director**, referring to Addendum 2, said that with respect to television broadcasting the Italian Administration had been undertaking legal and regulatory efforts on three levels: financial compensation for the voluntary release of frequencies; rationalization of the use of the spectrum; and must-carry obligations. He noted that the process for the voluntary release of frequencies had been completed but not all frequencies had been ordered to be switched off, so as to avoid conflict with a 2005 law stipulating that at least one third of all frequencies assigned to television broadcasting had to be assigned to local content. Switch-off was now expected to occur at the end of November 2016. Efforts to rationalize spectrum use had been accelerated. A new challenge to be faced by the Administration of Italy in managing the UHF spectrum was the obligation, expected to be decided at EU level, to make the 694-790 MHz band available to the mobile service by 2020 and the Administration of Italy was also taking steps to address this challenge. Dealing with harmful interference to sound broadcasting was more difficult and would take longer. The efforts made by the Italian Administration were described in Addendum 1 to Addendum 2, but improvement would not be as dramatic as for television broadcasting because it was more difficult to change the related law.

3.5 **Mr Strelets** considered that, as a result of the efforts made by the Board, the Radiocommunication Bureau and the Administration of Italy, a considerable amount of practical experience had been acquired in tackling the issue of eliminating interference to broadcasting stations between Italy and its neighbouring countries. The methods for releasing the second digital dividend for the mobile service were also worth noting. That constituted an entire interrelated set of legal, technical, financial and organizational measures that could usefully be taken up in ITU-R Study Group 1, with a view to their study and use by other countries.

3.6 **Mr Bessi**, while welcoming the financial and regulatory efforts made, stressed that the Administration of Italy should respect its commitments. The date for ending harmful interference to television broadcasting appeared to have slipped from the end of July to the end of November 2016.

3.7 The **Director** said that the Administration of Italy was rightly proceeding with caution in order to avoid legal challenges that might stall progress.

38 Mr Henri (Chief SSD), introducing those parts of the Director's report dealing with space systems, drew attention to Annex 3 showing the Bureau's work on the processing of filings related to space services. He provided updated information covering September 2016. As explained at the Board's previous meeting, the delay in processing coordination requests (Table 2 of Annex 3) had been caused by the large number of requests received at the close of WRC-15 relating to frequency bands allocated by the conference. Examination software has been since upgraded to process these new FSS bands and speed up the processing time that shows progress for a return to regulatory fourmonth time limits before the end of the year. With regard to cost recovery for satellite network filings, he drew attention to Annex 4 listing satellite network filings where payment had been received after the due date but prior to the BR IFIC meeting dealing with the matter. No filings had been cancelled as a result of non-payment during the period under consideration. Implementation of various provisions of the Radio Regulations to ensure that the MIFR reflected reality was described in § 5 of the Director's report. The application of § 6.6 and § 6.19 of Appendix 30B in the case of non-response by administrations was the subject of § 6 of the Director's report. The Bureau's practice to date had been to include the territory of another administration in the service area of a network only if the notifying administration had obtained explicit agreement from the responsible administration of that territory. The Bureau's practice was in line with WRC-07's endorsement of the output of Working Group 5B regarding the revision of Appendix 30B, requiring "explicit" agreement. That practice had been challenged by the Administration of Papua New Guinea, which argued that the notifying administration's obligation was limited to "seeking agreement". The matter was being brought before the present Board meeting in Document RRB16-3/7 under a separate agenda item. As indicated in § 7 of the Director's report, in line with the Board's decision at its previous meeting in regard to a submission from the Administration of Malaysia, the Bureau had re-examined the MEASAT-91.5E-30B satellite network under Appendix 30B and was preparing a modification to the AP30B/A6B special section in order to publish updated characteristics, with favourable findings for the network.

Finally, the Board was invited to note that the Bureau had accepted requests for suspension received more than six months from the date of suspension, as listed in Table 8 of § 8 of the Director's report.

3.9 The **Chairman** congratulated the Bureau on satisfactorily closing the case of the MEASAT-91.5E-30B satellite network. She said that the Board would take up the matter raised by the Administration of Papua New Guinea under a separate agenda item.

3.10 **Mr Koffi** not only congratulated the Bureau on its work on the case of the MEASAT-91.5E-30B satellite network but also thanked the Administration of Malaysia for agreeing to a reduction in power density values, thereby enabling the case to be closed once and for all.

3.11 **Mr Hoan** also congratulated the Bureau on resolving the case of the MEASAT-91.5E-30B satellite network but recalled that the Board's decision at its previous meeting had also requested the Bureau to perform studies and prepare guidance to administrations on the use of the relevant software. The follow-up to the latter part of the Board's decision had not been covered in the Director's report and he requested clarification of the activities undertaken.

3.12 **Mr Henri (Chief SSD)** said that the Bureau had continued to carry out studies since the Board's 72nd meeting as part of its efforts to update software to take account of the decisions of WRC-15. Version 8 of the software would be presented to administrations in detail at WRS-16 in December 2016.

3.13 **Mr Strelets**, referring to Table 2 of Annex 3 to the Director's report, expressed concern about the six month treatment time for coordination requests and the possible need by the Bureau for more resources to deal with increasingly complex processing.

3.14 The **Director** explained that peaks in the numbers of filings received had resulted for a while in more than 300 networks being under treatment. That number was being reduced and should soon be at a manageable level of around 150 networks. If the Bureau could not decrease the treatment time so as to respect the regulatory limit of 4 months, that would demonstrate the need for additional resources. **Mr Henri (Chief SSD)** added that a new engineer, who was a specialist in Appendix 30B, had been recruited to join SNP at the end of 2016 or early in 2017. He stressed the complexity of the software currently being developed by IAP in close collaboration with SSD and said that a beta version had already been tested by administrations.

3.15 **Mr Strelets** welcomed that clarification and asked whether, in future, the statistics provided by the Bureau could show separate statistics for GSO and non-GSO satellite networks. He said that such information would be useful, although he recognized that providing it would add to the Bureau's workload.

3.16 **Mr Henri (Chief SSD)** said that Table 2 of Annex 3 to the Director's report could in future indicate the number of GSO and non-GSO satellite networks received and published. He noted, however, that there were few non-GSO networks compared to GSO networks, and that satellite networks were dealt with in order of receipt. In other words, there were not separate queues, one for GSO and one for non-GSO. Lengthy treatment of GSO satellite networks might thus affect the treatment time for non-GSO satellite networks and vice versa.

3.17 **Mr Strelets**, referring to Annex 1 to the Director's report, said that the wording in the "Action taken" column corresponding to item 4.5 gave the impression that the BR IFIC meeting had approved a decision already taken by a higher authority, namely the Board. Furthermore, the text of item 6.1/6.2 was incorrect as no rule of procedure on No. 11.50 was included in Circular Letter CR/402.

3.18 **Mr Henri (Chief SSD)** thanked Mr Strelets for pointing out the error in item 6.1/6.2. With regard to item 4.5, he noted that all information in the BR IFIC had to be adopted by the BR IFIC meeting prior to publication.

3.19 The **Chairman** said that the text of Annex 1 to the Director's report would be amended appropriately (Corrigendum 1 to Document RRB16-3/3).

3.20 **Mr Strelets**, referring to Annex 4 to the Director's report, observed that satellite network filings were apparently not being considered by the BR IFIC weekly meeting immediately following the date on which payment was due. For example, the invoice date for ACES was 18 July 2016, the payment date was 19 August 2016 and the date of the weekly meeting was 7 September 2016. As another example, the invoice date for YAMAL-55E was 17 June 2016, the payment date was 20 June 2016 and the filing had been considered only on 4 August 2016. He asked why the Bureau was delaying consideration of the filings.

3.21 **Mr Henri (Chief SSD)** recalled Council Decision 482 on cost recovery and late payment, and the Bureau's long-standing practice which had been covered in a rule of procedure approved by the Board. If there was no response to the Bureau's efforts to contact an administration about payment due, then the filing was cancelled because of non-payment. If, however, the administration confirmed that payment had been made, a grace period was allowed for the transfer of funds and for administrative procedures within the ITU Financial Resources Management Department (FRMD). The Bureau had to await formal confirmation from FRMD that payment had been received. Thus, if the Bureau knew that payment had been made but had not yet received confirmation from FRMD, then consideration of the filing by the weekly meeting was postponed.

3.22 The **Chairman** suggested that the Board conclude on the Director's report as follows:

"The Board thanked the Director of the Radiocommunication Bureau for the Report and information provided in Document RRB16-3/3 and its Addenda. Furthermore, the Board considered in detail the information provided in Addenda 1 to 4 of Document RRB16-3/3 and noted with great satisfaction that, compared to the situation at the previous meeting, considerable progress had been made by the Administration of Italy to resolve the issue of harmful interference to the television broadcasting services caused by Italy to its neighbours. The Board nevertheless noted that because of administrative reasons the deadline of July 2016 had not been met, and that therefore some neighbouring countries had not noticed improvements of the situation yet. The Board expected that, by the new deadline of November 2016, most of the remaining critical issues concerning television broadcasting would be solved. The Board noted that the situation concerning sound broadcasting would be a continuous process to be solved gradually over a much longer time period."

3.23 It was so **agreed**.

3.24 **Mr Strelets**, referring to item 5 in Annex 1 to Document RRB16-3/3 and to the decision taken by the Board regarding Algeria's submission to the 72nd meeting, asked what measures had been taken by "the Bureau to continue providing assistance to the administrations involved in their efforts to find a solution to this matter."

3.25 **Mr Vassiliev (Chief TSD)** said that assistance would be provided by the Bureau if a country requested assistance, but no request had been received. If the Board so instructed, the Bureau could contact the countries concerned to offer assistance.

3.26 **Mr Bessi** said that various steps had been taken by the Bureau to allow administrations to consult the coordination and notification status of their assignments in the procedures involved. As Mr Vassiliev (Chief TSD) had made clear, however, no assistance had been provided to Algeria, and perhaps the Board should reiterate clearly the need for such assistance to be provided to the countries concerned.

3.27 **Mr Strelets** said that, along with comments on draft rules of procedure, Algeria's submission to the present meeting in Annex 10 to Document RRB16-3/4 accused the Board of failing to adequately address Algeria's submission to the Board's 72nd meeting, and now requested the Board to apply § 4.1.4.11 of the GE06 Agreement and issue a favourable finding for the assignments in question. It was an extremely sensitive matter, but the Board had no option but to address it.

3.28 The **Chairman** commented that at its 72nd meeting it had been the Board's understanding that Algeria had been requesting a rule of procedure to deal with the problems it had been encountering in the application of certain provisions of the GE06 Agreement. In responding to that

request, the Board had seen fit to call upon the Bureau to offer assistance to the administrations concerned, including the Administration of Algeria. Faced with Algeria's present submission, the Board could seek to decide on Algeria's request for a favourable finding, or follow Mr Bessi's suggestion for the Board to reiterate its call for the Bureau to provide assistance.

3.29 **Mr Ito** said that, notwithstanding Algeria's request to the 72nd meeting and the follow-up given to it, Algeria's request to the present meeting touched upon an extremely sensitive issue, namely that of tacit as opposed to explicit agreement, which always gave rise to lengthy debate. Rather than seek to take a decision on the request, which would inevitably set a precedent for the future, the Board would be better advised to request Algeria, the other administrations involved and the Bureau to get together with a view to resolving the matter. Wrongs appeared to have been committed on all sides in a highly controversial case, and the Board was not in a position to judge precisely who was right or wrong.

3.30 The **Director** suggested that Algeria was unlikely to enter into discussions with the Bureau and other administrations before the Board finalized the rule of procedure on the GE06 Agreement, i.e. until such time as the Board had clarified the rules governing the procedures in question.

3.31 **Mr Hoan** said that Algeria's request to the Board's 72nd meeting appeared to have been for the development of a rule of procedure to clarify decisions taken by the Bureau; Algeria's request to the present meeting was a clear appeal for the Board to review the decision it had taken at the 72nd meeting. The Board had no option but to address that appeal.

3.32 **Mr Bessi** said that in effect the decision taken by the Board at its 72nd meeting had not been implemented, since no assistance had yet been provided. There was no need to change that decision; rather, it should be given every chance to yield results, as advocated by previous speakers, and should therefore be reiterated. **Mr Koffi** agreed.

3.33 **Mr Magenta** agreed with the previous speakers, stressing that every effort should be made to reach agreement through consensus. No decision should be taken on Algeria's appeal until the Board had dealt with the draft rule of procedure on the GE06 Agreement.

3.34 **Mr Strelets** agreed with previous speakers that the matter was extremely sensitive, requiring further reflection. Algeria's submission involved two distinct matters, namely comments on the draft rules of procedure before the present meeting and criticism of the decision taken by the Board at its 72nd meeting. In his view, the two matters were not interrelated. He could nevertheless agree to defer consideration of Algeria's appeal for a favourable finding until later in the present meeting.

3.35 The **Chairman** suggested that the Board defer further consideration of Algeria's appeal for a favourable finding for its assignments published in IFIC 2798 until the Board had considered the rule of procedure on the GE06 Agreement.

3.36 It was so **agreed**.

3.37 Following the Board's subsequent approval of rules of procedure on the GE06 Regional Agreement, the **Chairman** invited the Board to resume its consideration of Algeria's appeal.

3.38 **Mr Koffi**, supported by **Mr Strelets** and **Mr Magenta**, proposed that the Bureau be requested to contact the Algerian Administration and the other administrations concerned with a view to resolving the matter.

3.39 The **Chairman** proposed that the Board conclude as follows:

"The Board considered the request from the Administration of Algeria in Document RRB16-3/4, Annex 10, to issue a favourable finding for Algeria's assignments published in BR IFIC 2798/07.07.2015. After consideration, the Board decided to instruct the Bureau to contact the Administration of Algeria and the other administrations concerned in an effort to resolve the matter and to report to the next meeting of the Board on the progress."

3.40 It was so **agreed**.

3.41 The Director's report in Document RRB16-3/3 and Corrigendum 1 and Addenda 1-4 and Addendum 1 to Addendum 2 was **noted**.

4 Consideration of draft rules of procedure – General comments (Circular Letters CCRR/56 and CCRR/57; Documents RRB16-2/3(Rev.2) and RRB16-3/4 + Corr.1)

4.1 The **Chairman** drew attention to the documents relating to draft rules of procedure before the present meeting. Circular Letter CCRR/56 contained a draft rule on the GE06 Regional Agreement. Circular Letter CCRR/57 contained, in Annex 1, draft new or modified rules consequential to the decisions taken by WRC-15 enshrined in the final acts of the conference and, in Annex 2, a compilation of WRC-15 decisions not appearing in the final acts of the conference but reflected in its minutes that might be candidates for rules of procedure. Document RRB16-2/3(Rev.2) contained, in its four attachments, respectively: those WRC-15 decisions which could require review of existing rules or the addition of new rules relating to RR provisions; WRC-15 decisions which could require new rules; existing rules which might require updating but not as a result of WRC-15 decisions; and decisions reflected in the WRC-15 plenary meeting minutes which might call for rules of procedure. Document RRB16-2/4 and its Corrigendum 1 contained comments received from 11 administrations on the draft rules contained in Circular Letters CCRR/56 and CCRR/57. She invited general comments on the documents before the meeting.

4.2 **Mr Strelets** drew attention to the comments by the United States Administration in Annex 11 to Document RRB16-3/4 relating to Annex 2 to Circular Letter CCRR/57, on the matter of incorporating in rules of procedure the decisions taken by WRC-15 reflected in its minutes regarding Nos. 11.32, 11.48, 11.49, 13.6, 21.14, 23.13B and Annex 3 to Appendix 30A. The United States' comments provided useful guidance on whether or not rules of procedure should be developed, based *inter alia* on whether the conference's decision called explicitly for a rule, whether or not the decision was sufficiently clear not to require a rule, etc. If the Board saw fit to follow the suggestions by the United States, it might save itself a considerable amount of time by not having to discuss a number of draft rules. He also noted that Circular Letter CCRR/57 presented draft rules on Nos. 1.112, 5.316B, 9.23 and A.17.d, even though the need for new or modified rules on those provisions had not been identified in Document RRB16-2/3(Rev.2) and had thus not been endorsed by the Board. Should the Board be taking up draft rules on those provisions at the present juncture?

4.3 Regarding Mr Strelets' second point relating to Document RRB16-2/3(Rev.2), **Mr Bessi** said that when the Board came to look at the draft rules on those four provisions it could decide, based on explanations from the Bureau, either to take the drafts up at the present meeting or to defer their consideration to a future meeting, republishing a further revision of Document RRB16-2/3 in the meantime. Perhaps the Bureau had good reason to request the Board to consider the drafts at the present meeting rather than wait, for example because they related to new provisions that would enter into force on 1 January 2017. Regarding Mr Strelets' first point, concerning the matter raised by the United States Administration, he said that the Board could usefully decide in principle on the approach it would take before entering into detailed discussion of the material presented in Annex 2 to Circular Letter CCRR/57. **Mr Hoan** endorsed those comments.

4.4 Responding to the comments, **Mr Henri (Chief SSD)** said that Document RRB16-2/3 contained non-exhaustive and preliminary lists of rules providing a draft time-frame for their consideration by the Board, thus to the Bureau's understanding it was to be regarded as a living document to be updated from one meeting to the next in the light of needs identified for new or revised rules. Sometimes the need for a draft rule was identified by the Bureau and acted upon immediately. For example, the need for a revised rule on No. 1.112 had not been identified in Document RRB16-2/3(Rev.2), but following the latter's preparation the Bureau had noted changes that could usefully be made to the existing rule consequent to decisions taken by WRC-15 regarding suppression of the API procedure for satellite systems subject to the coordination procedure under Article 9 and on the submission of requests for coordination related to non-GSO satellite systems. The Bureau had therefore prepared the draft revised rule and included it directly in Circular Letter CCRR/57 as the

most expedient means of proceeding with processing the draft rule with a view to its approval by the Board. A few other draft rules in Circular Letter CCRR/57 had been developed by the Bureau in a similar manner. On the other hand, some draft rules might not have been included in Circular Letter CCRR/57, possibly for reasons related to resources and time, but would be included in later circular letters. The Bureau stood ready to explain why any given draft rule had or had not been included in Circular Letter CCRR/57.

4.5 **Mr Bessi** said that he understood the Bureau's concerns and approach, but noted that No. 13.12A*a*) required the Bureau to publish on the ITU website a list of future proposed rules of procedure and the time-frame for their consideration by the Board and for comments by administrations. The United States Administration, in its comments to the present meeting, said that it required more time to consider the draft revised rule on No. 1.112 precisely on the grounds that prior to its inclusion in Circular Letter CCRR/57 it had not been identified for revision. The Board must take those comments into consideration.

4.6 **Mr Strelets** said that he too could regard Document RRB16-2/3 as a living document, but normally it was up to the Board to agree to the development of a given draft rule of procedure at the proposal of the Bureau, an administration or a Board member. Only under exceptional circumstances was any other approach admissible – such as the identification of an urgent need for a rule. The Board would now have to decide what to do with the rules developed and circulated to administrations for comment at the Bureau's sole initiative.

4.7 **Mr Henri (Chief SSD)** said that No. 13.12A*a)* referred to the publication of a list to provide administrations with an indication of what draft rules of procedure were to come, but made no reference to the list having to be exhaustive. Regarding the draft modified rule on No. 1.112, all those administrations that had commented appeared to support the draft rule, save one which appeared to invoke an administrative reason for opposing its consideration at the present meeting. In the past, draft rules had often been included directly in circular letters sent out to administrations for comment without having previously been published in the list of draft rules on the ITU website because their modification had been consequential to other draft new or revised rules developed. The Rules of Procedure had to be viewed as an interrelated whole, and to proceed with the revision of some rules while deferring that of others might be untenable.

4.8 **Mr Bessi** said that those comments could usefully be noted as justification for the Board's consideration of rules of procedure that had not necessarily been identified in the list of rules published on the ITU website but whose modification was nevertheless required consequent to changes made to other rules. It would be useful to have a list of all such rules considered by the Board in the past.

4.9 **Mr Henri (Chief SSD)** said that such a list could be produced.

4.10 **Mr Strelets** said that he strongly disagreed with the approach put forward by Mr Henri (Chief SSD). Draft rules could be developed only as determined by the Board, at the proposal of the Bureau, an administration or a Board member. The list of rules to be considered was indeed a living document, and was monitored by the Chairman and Vice-Chairman of the Working Group on the Rules of Procedure, but he was unaware of any rules that had been considered by the Board without previously having been on the published list. He could agree to consider the four draft rules before the present meeting that had not been included on the published list provided it was acknowledged that such consideration was in infringement of established practice and the Radio Regulations.

4.11 **Mr Ito**, supported by **Mr Magenta** and **Mr Koffi**, said that the Board should proceed with consideration of the draft rules before the present meeting, deciding case by case, when it encountered a rule that had not been included in the published list, whether or not to consider the rule.

4.12 It was so **agreed**.

5 Consideration of draft rules of procedure (Circular Letters CCRR/56 and CCRR/57; Document RRB16-3/4 + Corr.1)

5.1 The **Chairman** invited the meeting to take up the draft rules in Circular Letter CCRR/57 along with the comments received from administrations in Document RRB16-3/4.

MOD rule on No. 1.112

5.2 **Mr Matas (Head SSD/SPR)** introduced the draft modified rule on No. 1.112 and drew attention to the comments received from France (Annex 1 to Document RRB16-3/4) and the United States (Annex 11 to Document RRB16-3/4).

5.3 **Mr Bessi**, referring to the comments from the United States, asked the Bureau whether suppression of the API procedure for satellite systems subject to the Article 9 coordination procedure justified the draft modification of the rule, and whether consideration of the draft modification could be deferred to the Board's 74th meeting, by which time it could have been published in the list of rules in a revised version of Document RRB16-2/3.

5.4 **Mr Henri (Chief SSD)** said that the draft modification was indeed consequent to the suppression of the API procedure for satellite systems subject to the Article 9 coordination procedure, and was intended to cover the inconsistency between No. 1.112 and the information required under Appendix 4 to the Radio Regulations. It was also intended to clarify the Bureau's approach regarding the acceptance and processing of coordination requests for extremely large numbers of non-GSO satellites endorsed by WRC-15 at its 8th Plenary Meeting, and to include a reference to the changes made to the rule of procedure on the receivability of forms of notice. Consideration might be given to France's comments on § d) of the rule, possibly with a view to deleting that subparagraph. He saw no objection to deferring consideration of the draft rule to the Board's 74th meeting.

5.5 **Mr Bessi** suggested that at the present meeting the Board could agree solely to add the words "or coordination" to the existing rule, and leave consideration of the remaining modifications to the 74th meeting, meanwhile publishing the draft modification in the list in Document RRB16-2/3. That would give administrations ample time to consider the draft modifications, as requested by the United States.

5.6 **Mr Strelets** said that, as the Bureau might receive requests not only for API but also for coordination, the Board should agree to add the words "or coordination" at the present meeting. The **Director** suggested also adding the words "as appropriate". **Mr Henri (Chief SSD)** suggested that the Board also accept the cross-references to the rules of procedure on receivability in order to ensure consistency between the different rules of procedure.

5.7 It was **agreed** to accept those amendments.

5.8 Regarding the other changes to the rule on No. 1.112 proposed in Circular Letter CCRR/57, **Mr Strelets** said that they should not be taken up at the present meeting, but possibly at a future meeting. Regarding the comments by the Administration of France, however, he would not be able to agree to delete § d) of the existing rule, as to do so might imply ruling out various network configurations – GSO satellites working with fixed, mobile, mobile-platform stations, stations onboard aircraft and trains, GSO systems working with non-GSO systems, etc.

5.9 **Mr Kibe** said that the definitions in Article 1 of the Radio Regulations were fundamental to the activities of ITU-R and matters relating to them should ideally be taken up at a WRC. Nevertheless, there appeared to be a need to modify the existing rule on No. 1.112 before the next WRC, in order to take account of the decisions taken by WRC-15. Aside from the changes already agreed to, he would be in favour of instructing the Bureau to review the rule on No. 1.112 in the light of the comments received from France and the United States, with a view to the Board taking it up again at a subsequent meeting, as requested by the United States.

5.10 The **Director** supported that approach, noting that France was not proposing the deletion of $\S d$) of the existing rule, but was requesting the Board to consider its consequences in the light of

the decisions taken by WRC-15. Those comments merited consideration, and care should be taken not to overly narrow the scope of No. 1.112 in the terms established under the rule.

5.11 **Mr Ito** and **Mr Bessi** endorsed the previous speakers' comments; so too did **Mr Hoan** and **Ms Wilson**, who both said that the changes agreed to at the present meeting should be those required as a direct result of the decisions taken by WRC-15.

5.12 **Mr Henri (Chief SSD)** noted that consideration would also have to be given to the comments made by the Administration of Canada regarding the notion of satellite systems in terms of orbital characteristics and orbital planes.

5.13 The **Chairman** suggested that the Board confirm the changes it had already agreed to, and instruct the Bureau to further review the rule on No. 1.112 *inter alia* in the light of the comments received from administrations, with a view to its possible further consideration by the Board at a subsequent meeting.

5.14 It was so **agreed**.

5.15 On that understanding, the draft modified rule on No. 1.112, as amended, was **approved**, with effective date of application 1 January 2017.

ADD rule on Nos. 5.509D and 5.509E

5.16 The **Chairman** drew attention to the comment from France (Annex 1 to Document RRB16-3/4) supporting the draft rule on a temporary basis and proposing that it should be brought to the attention of the relevant ITU-R groups. She noted that the Russian Federation (Annex 3 to Document RRB16-3/4) and Canada (Annex 6 to Document RRB16-3/4) proposed wording to clarify the rule.

5.17 **Mr Sakamoto (Head SSD/SSC)** introduced the draft new rule, explaining that it was not clear what method was to be used for the examination of earth stations under No. 5.509D. The draft new rule therefore included a "line-of-sight" method that the Bureau would use until ITU-R developed a more appropriate method. France's comment was thus covered in the reasons given for the rule. The Bureau considered that the modifications proposed by the Russian Federation and Canada were valid and might be incorporated in the rule.

5.18 **Mr Bessi** said that he had no difficulty with the comments from administrations.

5.19 **Mr Kibe** agreed that the comments from administrations were valid. He noted, however, that all rules of procedure were essentially temporary. If a new method was developed, then the rule would be modified.

5.20 The **Chairman** suggested that the Board generally had no need to discuss the temporary nature of the present or subsequent draft rules in response to comments from administrations, bearing in mind the point made by Mr Kibe.

5.21 It was so **agreed**.

5.22 **Mr Henri (Chief SSD)** suggested that, in the Canadian proposal, it would be preferable to say "any earth station using that frequency assignment", rather than "associated with".

5.23 **Mr Strelets** pointed out that "using" was incorrect, because the text also referred to the coordination stage, prior to use.

5.24 **Mr Henri (Chief SSD)** suggested retaining the text originally proposed by the Bureau, "any earth station associated with the filed satellite network", which was in line with § A.16 *c*) of Annex 2 to Appendix 4 adopted by WRC-15.

5.25 It was so **agreed**.

5.26 The **Chairman** said that, apart from that phrase, the comments from the Russian Federation and Canada were to be incorporated but, as emphasized by **Mr Strelets**, **Mr Kibe** and **Mr Magenta**,

it would be inappropriate for the Board to request an ITU-R study group to develop a new calculation method.

5.27 On that understanding, the draft new rule on Nos. 5.509D and 5.509E, as amended, was **approved**, with effective date of application 1 January 2017.

ADD rule on No. 5.316B

5.28 **Mr Vassiliev (Chief TSD)** introduced the draft new rule on No. 5.316B proposed by the Bureau to avoid unnecessary application of the No. 9.21 procedure for administrations located at sufficiently large distances from the countries mentioned in footnote 5.312 (WRC-15). France (Annex 1 to Document RRB16-3/4) proposed adding the list of countries with territories less than 450 km from the countries mentioned in No. 5.312. The Bureau welcomed that proposed amendment, which could be reflected in an additional paragraph. The effective date of application of the rule should be aligned with the entry into force of the footnote and should therefore be 1 January 2017.

5.29 **Mr Hoan** and Mr **Kibe** supported the draft rule along with the amendment proposed by France.

5.30 **Mr Bessi** noted that the draft rule had not been listed in Document RRB16-2/3. No administration had however objected to the rule and the one administration that had commented had supported the rule. The rule would simplify the work of administrations and would not pose any difficulties to them. He proposed that the Board should adopt the draft rule as amended by France.

5.31 It was so **agreed**.

5.32 The draft new rule on No. 5.316B, as amended, was **approved**, with effective date of application 1 January 2017.

ADD rule on 5.328AA

5.33 **Mr Sakamoto (Head SSD/SSC)** introduced the draft new rule, noting that it was supported by the Administration of France. Responding to a question from **Mr Bessi** regarding the need for ITU-R study groups to establish criteria for carrying out examinations, he said that a similar rule of procedure existed on No. 5.327A. No Appendix 4 data elements had been decided by the WRC, thus making it impossible to undertake examinations, but the approach proposed in the draft rule posed no problems. If any difficulties were reported, thought could then be given to studies to resolve matters.

5.34 The draft new rule on No. 5.328AA was **approved**, with effective date of application 1 January 2017.

ADD rule on No. 5.341A

5.35 **Mr Vassiliev (Chief TSD)** introduced the draft new rule on No. 5.341A, drawing attention to the proposal by France (Annex 1 to Document RRB16-3/4) to add a provision to § 1 to exclude the band 1 427-1 429 MHz from the application of No. 9.21, and to add a list of the countries with territories less than 670 km from the countries mentioned in No. 5.342 in regard to application of No. 9.21. France supported the draft rule on a temporary basis and requested the Board to ask the relevant ITU-R groups to examine the method used to calculate the distance. He noted that the band 1 427-1 429 MHz was not allocated to the aeronautical mobile service and that no coordination was therefore required in that band.

5.36 **Mr Hoan** supported the French proposals and request.

5.37 **Mr Strelets** opposed adding the provision proposed by France to exclude the band 1 427-1 429 MHz from the application of No. 9.21, since IMT stations operating in that band might overlap into the 1 429-1 535 MHz band, which was used by aeronautical telemetry in the aeronautical mobile service. He and **Mr Magenta** considered that such a substantive amendment should be reviewed by administrations. 5.38 **Mr Bessi** considered that there was no need to add the text proposed by France for § 1, as the draft rule in Circular Letter CCRR/57 was clear.

5.39 **Mr Hoan** understood the concern expressed by Mr Strelets but said that scalable technology for IMT made it possible to use bandwidth of less than 2 MHz.

5.40 **Mr Vassiliev (Chief TSD)** suggested amending the wording proposed by France for § 1 to indicate that "the use of IMT stations which operate in the frequency band 1 427-1 429 MHz and do not overlap into the band 1 429-1 535 MHz, used by aeronautical telemetry in the aeronautical mobile service, is not subject to the agreement obtained under No. 9.21".

5.41 It was so **agreed**.

5.42 The **Chairman** reiterated that it was not for the Board to call on ITU-R study groups to develop calculation methods but suggested that the list of countries should be added as proposed by France.

5.43 It was so **agreed**.

5.44 The draft new rule on No. 5.341A, as amended, was **approved**, with effective date of application 1 January 2017.

ADD rule on No. 5.346

5.45 Mr Vassiliev (Chief TSD) introduced the draft new rule on No. 5.346, recalling that the footnote had been discussed at length at WRC-15. As for the new rule on No. 5.341A, France (Annex 1 to Document RRB16-3/4) proposed adding a list of the countries with territories less than 670 km from the countries mentioned in No. 5.342, subject to application of No. 9.21. France again supported the draft rule on a temporary basis and requested the Board to ask the relevant ITU-R groups to examine the method used to calculate the distance. The Russian Federation (Annex 3 to Document RRB16-3/4) proposed adding a list of all the countries with territories less than 670 km from the countries mentioned in No. 5.342. At WRC-15, the Director had explained that the footnote dealt with the relationship between the countries listed in it and the countries listed in No. 5.342. The conference had approved the footnote with that explanation (§ 22.37 of WRC-15 Document 511 minutes of the fourteenth plenary meeting). At the conference, the CEPT countries had been invited to join the footnote but had declined. The list of countries that the Russian Federation was now proposing to add to the rule included some CEPT countries. Bearing in mind the explanation given by the Director at WRC-15, the act of including the names of those countries in the rule on No. 5.346 would implicitly oblige all the countries mentioned to coordinate under No. 9.21 with the countries listed in No. 5.342. According to the conference decision, the coordination procedure under No. 9.21 would apply only to countries specifically listed.

5.46 **Mr Bessi** said that the proposal by France (which in his understanding meant to list only Iraq) was acceptable but the proposal by the Russian Federation went beyond Article 5 of the Radio Regulations.

5.47 **Mr Strelets** said that in his understanding the proposal by France, to include "the list of countries whose territories are less than 670 km from that of the countries listed in No. 5.342", was the same as the proposal by the Russian Federation. The conference had identified certain bands for IMT but there were no regulatory provisions prohibiting IMT in other bands. He stressed the importance of protecting aeronautical telemetry, which was essential for flight safety. The full list of countries proposed by the Russian Federation would be helpful. An alternative would be to list all countries that did not need to coordinate under No. 9.21.

5.48 **Mr Magenta** and **Ms Wilson** preferred to list only the countries that had to coordinate under No. 9.21.

5.49 The **Chairman** suggested that the list should contain only Iraq.

5.50 It was so **agreed**.

5.51 The draft new rule on No. 5.346, as amended, was **approved** with effective date of application 1 January 2017.

MOD rule on band 2 605-2 655 MHz

5.52 **Approved**, subject to an amendment to the title of the draft rule further to a proposal by the Administration of the Russian Federation; effective date of application 1 January 2017.

MOD rule on No. 5.510

5.53 **Approved**, subject to a minor editorial amendment; effective date of application 1 January 2017.

MOD rules on the receivability of forms of notice

5.54 **Mr Matas (Head SSD/SPR)** introduced the draft modified rule, noting that most of the changes to it came further to WRC-15's suppression of the API procedure for satellite systems subject to the Article 9 coordination procedure and suppression of SpaceWISC. Comments had been received from the Administrations of France, the Russian Federation and Canada in Annexes 1, 3 and 6 to Document RRB16-3/4, respectively. He noted that the Russian Federation's comments related mainly to the Russian version of the draft rule. Commenting on each section of the draft revised rule, he said that Canada proposed not to retain the addition of "or 9.2" to § 3.2 of the existing rule; the Bureau had no problem accepting that proposal. Canada also proposed not to retain § 4.1, commenting that the API information contained nothing regarding the date of bringing into use and that § 4.1 was therefore not implementable; the Bureau considered that proposal logical.

5.55 The Board **agreed** to accept Canada's proposals regarding § 3.2 and § 4.1 of the rule.

5.56 Regarding § 4.4.3, various suggestions were made with a view to improving the text in line with comments received from the Administrations of France and Canada, further to which **Mr Henri** (**Chief SSD**) said he would provide a revised text incorporating the best of those comments but more accurately reflecting precisely how the various provisions of the Radio Regulations were implemented.

5.57 On that understanding, the revised rule of procedure on the receivability of forms of notice, as amended, was **approved**, with effective date of application 1 January 2017.

Rules on Article 9: SUP rule on No. 9.2, SUP rule on No. 9.2B, SUP rule on No. 9.5B, SUP rule on No. 9.5D and MOD rule on No. 9.23

5.58 **Approved**, with effective date of application 1 January 2017.

MOD rules on Table 9.11A

5.59 **Mr Sakamoto (Head SSD/SSC)** drew attention to the proposal by France that the modification regarding the band 1 610-1 626.5 MHz should be effective immediately. The Bureau supported that proposal.

5.60 It was so **agreed**.

5.61 **Mr Sakamoto (Head SSD/SSC)** drew attention to the proposal by Canada to amend the draft rule in regard to the band 6 700-7 075 MHz, thus elegantly covering GSO and non-GSO together. The Bureau supported that proposal.

5.62 It was so **agreed**.

5.63 The rules on Table 9.11A, as amended, were **approved**, with effective date of application immediately after the approval of the proposed rules for the bands 149.9-150.05 MHz, 399.9-400.05 MHz and 1 610-1 626.5 MHz, and effective date of application 1 January 2017 for the other bands.

MOD rule on No. 9.47 and MOD rule on No. 9.62

5.64 **Approved**, with effective date of application 1 January 2017.

MOD rule on No. 11.28

5.65 **Mr Matas (Head SSD/SPR)** introduced the draft revised rule on No. 11.28 and drew attention to the comments received from the Administration of Canada in Annex 6 to Document RRB16-3/4.

5.66 **Mr Ito** said that the order proposed by Canada for paragraphs 1)-4) appeared to be more logical than the order proposed by the Bureau. Regarding content, he asked what limits were referred to in the expression "within the limits" in the text proposed by the Bureau.

5.67 **Mr Koffi** said that Canada's version of § 1 of the draft rule was clearer than that contained in Circular Letter CCRR/57.

5.68 **Mr Bessi** wondered what purpose was served by § 2 of the draft rule in Circular Letter CCRR/57, in that it did not indicate the consequences of failure to fall within the limits of the characteristics published in the API special section. New § 2 put forward by Canada was preferable in that it clearly indicated the possible need to re-apply Article 9. He deemed § 3 as put forward by Canada to be superfluous.

5.69 **Mr Strelets** generally endorsed the text put forward by Canada as being clearer than the text proposed in Circular Letter CCRR/57. He supported Mr Bessi's comments regarding the text proposed by Canada for § 2, but questioned whether § 3 put forward by Canada should be deleted, as to do so would perhaps give administrations additional but unjustified freedom to change characteristics for the purposes of coordination and other reasons. Thought might be given to merging Canada's § 3 with § 2.

5.70 **Ms Wilson** said that there was a difference between indicating that characteristics were or were not "within the limits of those published" (wording proposed by the Bureau) and indicating that characteristics were or were not "different from those published" (wording proposed by Canada). She wondered which wording best reflected the intended meaning.

5.71 **Mr Sakamoto (Head SSD/SSC)** having endorsed the texts put forward by Canada for § 2 and § 3, the **Chairman** proposed, in the light of the comments made, that the entire text put forward by Canada be retained for the draft revised rule on No. 11.28.

5.72 On that understanding, the draft revised rule on No. 11.28 was **approved**, with effective date of application 1 January 2017.

MOD rule on No. 11.32 and MOD rule on No. 11.32A

5.73 **Approved**, with effective date of application 1 January 2017.

MOD rules on No. 11.44

5.74 **Mr Henri (Chief SSD),** introducing the draft modified rules on No. 11.44, drew attention to the comments by administrations in Document RRB16-3/4: France (Annex 1), the Russian Federation (Annex 3), the United Kingdom (Annex 5), Canada (Annex 6), Luxembourg (Annex 9) and the United States (Annex 11). The purpose of the draft rules was to clarify the treatment by the Bureau of information on the bringing into use of non-GSO satellite networks received between WRC-15 and WRC-19. Responding to a query by **Mr Strelets** as to which services were covered by the draft rules, he confirmed that the draft rules were intended to apply to FSS and MSS and agreed that the rules should specify FSS and MSS, as proposed by an administration.

5.75 The **Chairman** noted that no comments had been received on NOC 1 or SUP 2. She proposed that NOC 1 and SUP 2 should be approved, with 1 January 2017 as the effective date of application of SUP 2.

5.76 It was so **agreed**.

5.77 **Mr Strelets** observed that two non-GSO satellite networks, Globalstar and Iridium, were already operating and no problems had been encountered. It seemed that the existing procedure worked efficiently and he queried why it should be changed.

5.78 **Mr Henri (Chief SSD)** agreed that the few non-GSO satellite networks so far recorded in the MIFR had not yet caused difficulties but pointed out that the existing constellations comprised fewer than a hundred or so satellites operating in different frequency bands. The Bureau, however, was now faced with filings for non-GSO networks with constellations comprising hundreds up to thousands of satellites that would operate in the Ku or Ka bands and be brought into use prior to WRC-19 for some of them. The Bureau considered that, along with bringing into use one space station on one orbit, the notifying administration should provide a deployment plan for the other hundreds of satellite of the constellation and state the minimum number of satellites necessary to offer the proposed service, to demonstrate the sustainability and seriousness of the project. That information would be published without formal examination by the Bureau.

5.79 **Mr Bessi** referred to the variety of comments from administrations, with both support for parts of the draft rules and objections to other parts. Some of the comments concerned principles, others related to terminology. He proposed that the Board consider the draft rules sentence by sentence. **Mr Ito** endorsed that approach, adding that the Bureau needed a procedure for defining the bringing into use of non-GSO systems. **Mr Hoan** agreed that the Board should approve rules on the bringing into use of non-GSO systems.

5.80 **Ms Wilson** said that the draft rules concerned a sensitive matter that was being studied by Working Party 4A. The Board should not overreach its authority in approving the rules.

5.81 **Mr Bessi** and Mr **Strelets** observed that WRC-15 had not called for a deployment plan or for information on the minimum number of satellites. **Ms Wilson** agreed and said that it would be wise to await the output of Working Party 4A.

5.82 Following consideration of a consolidated document introduced by **Mr Botha (SGD)** containing the texts proposed by administrations as well as the draft rule prepared by the Bureau, the Board **approved** an amended version of ADD 2 with effective date of application immediately after approval of the rules. The Board thus **approved** the entire rule, as amended.

MOD rule on No. 11.44B

5.83 **Approved**, subject to incorporation of the proposals put forward by the Administrations of France and Canada, with effective date of application 1 January 2017.

MOD rule on Nos. 11.49 and 11.49.1

5.84 **Mr Matas (Head SSD/SPR)** introduced the draft revised rule, drawing attention to the comments received from the Administrations of France and the United States.

5.85 **Mr Ito** said that the proposals by the Administration of France made WRC-15's decisions explicit in the rule of procedure, rather than simply implicit. He could therefore support those proposals.

5.86 **Mr Matas (Head SSD/SPR)** said that the Bureau would prefer to retain its proposed text for § 2.1, as it more accurately reflected the action taken by the Bureau, which published on the web the date of resumption of use indicated by the notifying administration.

5.87 **Mr Henri (Chief SSD)** requested that reference be added at the end of § 2.4.2 to "Appendices 30, 30A and 30B, as appropriate", in order to cover suspension of use in the Plans.

5.88 Subject to that amendment and to incorporation of the amendments put forward by the Administration of France to § 2.4.1 and § 2.4.2, the revised rule on Nos. 11.49 and 11.49.1 was **approved**, with effective date of application 1 January 2017.

MOD rule on No. 11.50

5.89 **Mr Henri (Chief SSD)** introduced the draft revised rule on No. 11.50, which the Bureau had prepared further to the instructions received from the Board at its 72nd meeting. He noted that the Administration of France had submitted comments (Annex 1 to Document RRB16-3/4).

5.90 Following comments by **Mr Strelets, Ms Wilson** and **Mr Bessi**, **Mr Henri (Chief SSD)** said that the amendment proposed by the French Administration to the last sentence of the text of § 5 in CCRR/57 was already covered by the text of the opening paragraph of the existing rule ("unless otherwise decided by the Conference").

5.91 The draft revised rule on No. 11.50 was **approved**, subject to deletion of the words "for the submission", as proposed by France, with effective date of application immediately after approval of the revised rule.

ADD rule on Annex 2 to Appendix 4

5.92 **Approved**, with effective date of application immediately after approval of the new rule.

ADD rule on item A.17.d (Appendix 4)

5.93 **Mr Sakamoto (Head SSD/SSC)** introduced the draft new rule, noting that it had not appeared in the list of rules published in Document RRB16-2/3(Rev.2). No comments had been received from administrations.

5.94 The draft new rule was **approved**, with effective date of application 1 January 2017.

MOD rule on § 3.5.1 and § 3.8 of Annex 5 to Appendix 30

5.95 **Approved**, with effective date of application 1 January 2017.

MOD rule on § 1.7 of Annex 3 to Appendix 30A

5.96 **Approved**, with effective date of application 1 January 2017.

SUP § 8.17 of Appendix 30B

5.97 **Approved**, with effective date of application 1 January 2017.

ADD rules on Resolution 49 (Rev. WRC-15)

5.98 **Approved**, with effective date of application 1 January 2017.

MOD rules on Part B, Section B6

5.99 **Mr Bogens (Acting Head TSD/FMD)** introduced the draft revised rules, drawing attention to the comments received from the Administrations of France and the Russian Federation in Annexes 1 and 3 to Document RRB16-3/4, respectively.

5.100 The Board **agreed** to accept the Russian Federation's proposed amendments to the text, which were intended to improve its readability and facilitate subsequent references to it.

5.101 Regarding the French Administration's comments, the **Chairman** recalled the Board's decision taken earlier at the present meeting that except under exceptional circumstances no reference was to be made to the approval of rules of procedure on a temporary basis.

5.102 With respect to the request of the Administration of France to clarify the draft rule of procedure on Section B6 and the reasons for a different treatment of the frequency band 3 300-3 400 MHz compared with other frequency bands, the Board **noted** the following explanation provided by the Bureau:

"In the bands below 3 GHz the Bureau performs calculations of the interfering field strength for every station using its notified radiated power and effective antenna height using a software tool based on Recommendation ITU-R P.1546. This Recommendation applies in the band 30-3 000 MHz. This tool

allows the Bureau to process a large number of notices, which are expected in the frequency bands allocated to the mobile service and/or identified for IMT by WRC-15.

However, for the band 3 300-3 400 MHz Recommendation ITU-R P.1546 is not applicable. Instead, Recommendation ITU-R P.528 is used. For this Recommendation the Bureau has no software to calculate the interfering field strength. If a large number of IMT stations are notified, it would be impossible to calculate the interfering field strength manually for every station in order to identify the affected countries. At the same time the Bureau has software based on the ITU Digitized World Map (IDWM) that calculates distances from the location of a notified terrestrial station to the borders of neighbouring countries.

For these reasons, a single coordination distance value of 616 km is proposed for the band 3 300-3 400 MHz. This distance is calculated using typical values of IMT-Advanced stations and the protection requirements of stations in the radiolocation service."

5.103 Subject to incorporation of the Russian Federation's proposed amendments and to alignment of the French version of Table 1 with the English version as requested by France, the revised rules on Part B, Section B6, were **approved**, with effective date of application 1 January 2017.

5.104 Moving on to Annex 2 to Circular Letter CCRR/57, the **Chairman** drew attention to a general comment by the United States (Annex 11 to Document RRB16-3/4) that, with the exception of WRC-15 decisions specifically calling for the development of rules of procedure, WRC-15 decisions should not be directly included in rules of procedure.

5.105 The **Director** expressed sympathy with the comment made by the United States, noting that conference decisions could not be changed. Nevertheless, it would be helpful to administrations to bring RR interpretations by the Board and WRCs together in a single document. He therefore suggested that WRC-15 decisions taken in plenary should be reproduced verbatim for information in the Rules of Procedure, with a note (not part of the rules) simply indicating the origin of the decision.

5.106 Mr Bessi and Mr Magenta supported the approach suggested by the Director.

5.107 **Mr Strelets** welcomed the new approach suggested by the Director but said that the Board should nevertheless examine the specific comments received.

5.108 **Mr Henri (Chief SSD)** drew attention to comments from France (Annex 1 to Document RRB16-3/4) in regard to No. 9.19 and No. 11.48, and from Canada (Annex 6 to Document RRB16-3/4) in regard to No. 11.48. He pointed out that certain WRC plenary meeting decisions did not take account of subsequent decisions taken by the same WRC, and suggested that the Bureau should add the necessary explanation in the form of footnotes.

5.109 **Mr Strelets** observed that such an approach would work for No. 11.48 but that it would be more difficult to deal with No. 9.19 as the conference had not ruled on the matter. In its comments, France had queried the choice of 1 000 km in the draft rule proposed by the Bureau.

5.110 **Mr Vassiliev (Chief TSD)** said that, with a view to avoiding unnecessary coordination under No. 9.19 to protect the broadcasting-satellite service (BSS), the Bureau had considered a worst case scenario for the range 700 MHz to 76 GHz, which had led to a distance of 842 km, and being very cautious had rounded that up to 1 000 km. Working Party 4A was studying the problem and when the results became available, the Bureau could update its proposal for a rule of procedure.

5.111 **Mr Ito**, **Mr Bessi**, **Ms Wilson**, **Mr Magenta** and **Mr Strelets** thanked the Bureau for the explanation but stressed that the WRC-15 plenary meeting decisions should be left untouched, with explanatory notes as appropriate.

5.112 **Mr Vassiliev (Chief TSD)** pointed out that the current rule on No. 9.19 was in conflict with the WRC-15 plenary meeting decision and that some amendment was therefore necessary.

5.113 The **Chairman** suggested that the Bureau should draft a rule of procedure on No. 9.19 to be considered at the next meeting of the Board.

5.115 The **Chairman** suggested that the Board conclude as follows on Circular Latter CCRR/57:

"The Board discussed in detail the draft Rules of Procedure circulated to administrations in Circular Letter CCRR/57, along with comments received from administrations (Documents RRB16-3/4 and RRB16-3/4(Corr.1)). The Board adopted the Rules of Procedure with modifications as contained in Annex 1 [to the summary of decisions – Document RRB16-3/11].

Concerning those decisions of WRC-15 reflected in the minutes of the conference that have an impact on the Rules of Procedure, the Board decided to refer to them in the Rules of Procedure as contained in Annex 2 [to the summary of decisions – Document RRB16-3/11], in the form of notes."

5.116 It was so **agreed**.

Draft rule of procedure on the GE06 Regional Agreement (Circular Letter CCRR/56; Document RRB 16-3/4)

5.117 Mr Vassiliev (Chief TSD) said that the draft rule of procedure on the GE06 Regional Agreement in Circular Letter CCRR/56 had been prepared further to the instructions issued by the Board at its 72nd meeting, specifically with a view to ensuring that, prior to the end of the corresponding deadlines, the administrations to which a reminder had been sent pursuant to § 4.1.4.10 of the GE06 Agreement had received those reminders. The Bureau's solution to the problem would consist in sending reminders to the administrations concerned and also posting the reminders and days remaining to respond on the ITU website, thus making all that information known to all GE06 Agreement administrations. He drew attention to the comments received from the Algerian Administration in Annex 10 to Document RRB16-3/4 and the changes proposed by Algeria to the draft rule proposed by the Bureau, noting that Algeria had based its comments and proposals on the wording in the draft rule "...the Bureau will make them [the reminders] also available for the administrations concerned using another means of electronic communication." Thus, Algeria had not been aware of the specific solution now proposed by the Bureau involving website publication, and appeared to assume from the reference to 'another means of electronic communication" that the Bureau intended to send out e-mails in addition to the fax reminders. Having recalled the exceptional circumstances obtaining in the case involving Algeria and other administrations as discussed by the Board at its 72nd meeting, representing the first time problems had arisen in the ten years since the provisions had first been implemented, he said that the Bureau's proposed solution was simple and should prove effective, whereas the text put forward by Algeria, which had not been seen by other administrations, would place an additional and unnecessary administrative burden on administrations and the Bureau. The Administrations of France, Armenia, the Russian Federation and Denmark had all submitted comments in support of the draft rule proposed by the Bureau.

5.118 **Mr Bessi** said that as Chairman of the Working Group on the Rules of Procedure he had examined the solution proposed by the Bureau and was convinced that it would resolve the problems encountered.

5.119 **Mr Strelets** noted that the exceptional circumstances referred to by Mr Vassiliev (Chief TSD) could not serve as justification for non-compliance with the provisions of the GE06 Agreement, and a clear rule of procedure was therefore called for. Reference to "another electronic means of communication" was vague, and Algeria's proposals were indeed clearer. Publication on the ITU website might provide the solution. The draft rule required further development, following which perhaps it should be sent out again to administrations for comment.

5.120 Responding to a question by **Ms Wilson**, **Ms Ghazi (Head TSD/BCD)** provided details of how transparency would be increased significantly under the solution proposed by the Bureau: the initial reminder sent by fax to an administration would also appear in the MyAdmin of the administrations concerned – both the administration requesting that the reminder be sent and those to which it was sent. At the same time an e-mail would be sent out automatically to the focal point identified under Circular Letter CR/408. If an administration failed to respond, a further reminder

would be sent out by e-mail ten days before the deadline, with the correspondence again appearing in the MyAdmin of all the administrations concerned.

5.121 Following proposals by **Mr Bessi, Mr Hoan** and **Ms Wilson**, it was **agreed** that the solution being proposed by the Bureau, which they endorsed, would best be reflected in the draft rule by adding the phrase "e.g. using the web application "MyAdmin"" (see CR/408, dated 5 July 2016)" at the end of the fourth paragraph of the rule proposed by the Bureau. Moreover, it would be logical to reverse the order of the third and fourth paragraphs in the draft rule proposed by the Bureau.

5.122 **Mr Strelets** said that while the first of the two new paragraphs proposed by Algeria was now covered by the amendments agreed to, the second could remain relevant.

5.123 **Mr Bessi** said that the content of that paragraph already appeared in the GE06 Agreement itself, in § 4.1.4.11.

5.124 **Mr Vassiliev (Chief TSD)** reiterated that to introduce the two new paragraphs proposed by Algeria would increase the administrative workload of administrations and the Bureau in a manner that was unwarranted: the problems encountered had arisen only once in the ten years since the Agreement had been in force, and the solution proposed by the Bureau should amply suffice. Moreover, the GE06 administrations had not had the opportunity to comment on the implications of the texts proposed by Algeria. **Mr Khairov** endorsed those comments.

5.125 Subject to the agreed amendments and a few editorial refinements, the draft new rule on the GE06 Regional Agreement (Part A10) was **approved**.

6 Consideration of draft rules of procedure — List of proposed rules (Document RRB16-2/3(Rev.2))

6.1 Shortly before the closure of the meeting, **Mr Bessi**, speaking as the Chairman of the Working Group on the Rules of Procedure, said that it was proposed that Revision 3 of Document RRB16-2/3 be issued following the present meeting and approved by the Board members by correspondence. Revision 3 would include, *inter alia*, updates he had received from Mr Henri (Chief SSD) and Mr Vassiliev (Chief TSD).

6.2 **Mr Strelets** warned against the Board starting to approve documents by correspondence between meetings, but said that he could agree to do so with the document in question on an exceptional basis, since there was insufficient time to consider it properly at the present meeting.

6.3 **Mr Henri (Chief SSD)** noted, following the Board's review of the rule of procedure on No. 1.112, that certain amendments were being agreed to at the present meeting, whereas the consideration of other proposed amendments was being deferred. The future consideration of the deferred amendments of that rule of procedure would therefore be reflected in the next version of Document RRB16-2/3, and included in the next circular letter containing draft rules of procedure to be sent out to administrations for comment.

6.4 The Board **agreed** to conclude on the matter as follows:

"Based on information provided by the Bureau, the Board decided to update the list of proposed Rules of Procedure in Document RRB16-2/3(Rev.2) and requested the Chairman of the Working Group (WG) on the Rules of Procedure to circulate to the RRB members the list of proposed draft Rules of Procedure, for approval by correspondence, and instructed the Bureau to prepare the relevant draft Rules of Procedure."

7 Submission by the Administration of Indonesia requesting an extension of the regulatory time-limit to bring back into use the frequency assignments of the PALAPA-C3-K satellite network (Document RRB16-3/1 and Addendum 1)

7.1 **Mr Matas (Head SSD/SPR)** introduced Document RRB16-3/1 and Addendum 1, containing a request by the Administration of Indonesia for an extension of the regulatory time-limit for the bringing back into use of the suspended frequency assignments of the PALAPA-C3-K satellite network. The request was based on the launch failure of the Telkom-3 satellite.

7.2 **Mr Bessi** pointed out that in Addendum 1 the Administration of Indonesia requested an extension until April 2017, as compared with an extension of one year until 6 July 2017 mentioned in Document RRB16-3/1.

7.3 **Mr Henri (Chief SSD)** suggested that, given the risks of possible delay in launching the replacement satellite Telkom-3S, an extension of one year would be preferable for the administration.

7.4 **Mr Strelets** said that the Board should respond favourably to the request by the Administration of Indonesia, recognizing the administration's effort to find a temporary solution by leasing a satellite which, however, did not cover the whole frequency range of the PALAPA-C3-K network. The loss of the Telkom-3 satellite constituted a *force majeure* event and the Board should grant a limited and qualified extension, respecting the three-year period set in No. 11.49 for bringing back into use.

7.5 **Mr Hoan** shared the concern expressed by Mr Strelets, noting that the launch failure and other difficulties had preventing the bringing back into use of certain frequency assignments within the three-year period specified in No. 11.49. Nevertheless, No. 0.3 referred to "taking into account the special needs of the developing countries and the geographical situation of particular countries". Bearing in mind that Indonesia was a developing country made up of more than 17000 islands, he considered that the Board should accept the administration's request.

7.6 Responding to a request for clarification by **Mr Kibe** concerning the several periods of suspension of the frequency bands of the PALAPA-C3-K satellite network, **Mr Henri (Chief SSD)** explained that the C bands had been in use for years at 118°E in conformity with the Radio Regulations but the Ku bands filed under the PALAPA-C3-K satellite network were to have been brought into use by the Telkom-3 satellite, which had been lost, triggering a few subsequent requests for suspension. As an interim solution to resume the Ku band operation, a leased satellite, ASIASAT-3S, was used but did not cover all the Ku bands of the PALAPA-C3-K network. For those bands in operation on the ASIASAT-3S satellite, at the end of the lease a new request for suspension was requested and accepted up to 1 June 2018. For the remaining frequency assignments not on-board the ASIASAT-3S satellite in the bands 11 452-11 628 MHz and 13 758-13 934 MHz, the deadline under No. 11.49 for bringing back into use was 6 July 2016. The new satellite to be launched, Telkom-3S, would cover all the bands of the PALAPA-C3-K network.

7.7 **Mr Kibe** said that, although the Administration of Indonesia mentioned some previous decisions by the Board, it was the Board's practice to consider each individual case on its own merits. The loss of the Telkom-3 satellite satisfied the conditions for *force majeure* and Indonesia had clearly demonstrated its commitment to launching the replacement satellite. The Board should grant an extension until July 2017 to cover unexpected circumstances.

7.8 **Mr Koffi** agreed that Indonesia had made enormous efforts to bring the frequency bands into use and to launch the replacement satellite. He was in favour of granting an extension until April 2017.

7.9 **Mr Bessi**, **Ms Wilson** and **Mr Magenta** recognized the efforts made by the Administration of Indonesia, as described by previous speakers, and favoured granting the administration's request for an extension until 6 July 2017.

7.10 Responding to a question by **Mr Khairov** concerning the frequency band capacity of the Telkom-3S satellite, **Mr Henri (Chief SSD)** said that the satellite was still under construction and its capacity was not known for certain, but according to information provided by the satellite manufacturer and the administration the satellite would have the capacity to cover all the C and Ku bands of the PALAPA-C3-K satellite network.

7.11 **Mr Khairov** noted the importance of those frequency bands at 118°E for Indonesia and expressed the hope that the new satellite would have the requisite capacity. Certain of those bands had not been used for a decade, and would not be used for a few more years. Perhaps the Board should draw the attention of the conference to the importance of checking that administrations or operators were not holding on to frequency assignments without using them. If frequency assignments were being left unused, they should be freed for use by others.

7.12 **Mr Bin Hammad** said that Indonesia, as a developing country, had ambitious plans for satellite communications and had made huge efforts to achieve those plans. There was a clear case of *force majeure* and, like other speakers, he considered that the Board should grant an extension until 6 July 2017.

7.13 **Mr Ito** and **Mr Terán** agreed with previous speakers that the Board should grant an extension until 6 July 2017.

7.14 Responding to a query by **Mr Strelets**, **Mr Henri (Chief SSD)** assured the Board that confidential information available to the Bureau from the satellite manufacturer and launch service confirmed the details provided by the administration.

7.15 Mr Strelets expressed a general concern that administrations might try to use the Board's decisions to seek ever longer extensions of regulatory deadlines. He stressed that the Board's decisions to extend time-limits were taken on a case by case basis and did not set a precedent. Mr Magenta, Mr Kibe and Ms Wilson endorsed that opinion.

7.16 The **Chairman** suggested that the Board conclude as follows:

"The Board considered the request from the Administration of Indonesia contained in Documents RRB16-3/1 and RRB16-3/1(Add.1) and reiterated that any decisions made by the Board to extend the regulatory time-limit to bring frequency assignments into use would be based on the specific merits of each request and in line with the decisions and instructions of the WRC and should not serve as a precedent for any future decisions. The Board examined in detail the request from the Administration of Indonesia and noted that the case fulfilled the conditions of *force majeure*, that the administration made efforts to meet the regulatory time limit and that the request was for a defined and limited extension. Based on these considerations, the Board decided to agree to the request from the Administration of Indonesia and to grant an extension of the regulatory time limit for bringing into use the frequency assignments in the frequency bands 11 452-11 628 MHz and 13 758-13 934 MHz to the PALAPA-C3-K satellite network to 6 July 2017."

7.17 It was so **agreed**.

8 Submission by the Administration of Papua New Guinea requesting an extension of the regulatory time-limit to bring into use the frequency assignments of the NEW DAWN 21 satellite network at 60°E (Document RRB16-3/2 and Addendum 1)

8.1 **Mr Matas (Head SSD/SPR)** introduced Document RRB16-3/2 and Addendum 1 relating to the Administration of Papua New Guinea's request for the Board to extend the regulatory time-limit for bringing into use the frequency assignments to the NEW DAWN 21 satellite network at 60°E. Outlining the details of the case, he said that the original bringing-into-use deadline of 28 August 2016 had not been met owing to events beyond the control of the operator (ArianeSpace could not secure the co-passenger for the launch), resulting in the launch of the satellite involved, IS-33e, on 24 August 2016. The latest information available, in Addendum 1 to Document RRB16-3/2, was that the satellite had faced further delays in orbit-raising as a result of malfunction in the primary thruster,

and the satellite was now expected to arrive at the nominal orbital position 60°E in mid-December 2016.

8.2 **Mr Strelets** said that the Administration of Papua New Guinea appeared to have taken all possible steps to comply with the regulatory time-limit, the satellite had been ready, but launch had been delayed owing to co-passenger unavailability. Matters had been resolved, but now additional time was required for the satellite to reach its orbital position. He viewed the situation as involving a straightforward case of co-passenger delay, and would therefore see no reason not to accede to Papua New Guinea's request.

8.3 **Mr Bessi** expressed similar views, noting that the documentation before the Board included correspondence from ArianeSpace and Intelsat bearing out the fact that co-passenger issues had delayed launch of Papua New Guinea's satellite. To accede to the request fell within the competence of the Board, and the regulatory extension was of barely four months. The satellite was in orbit, and on its way to its orbital position. The Board should accede to Papua New Guinea's request to extend the deadline to mid-December.

8.4 **Ms Wilson** agreed with the previous speakers, adding that the operator had not only done all it could to meet deadlines but had also taken risks in accelerating the development of the second satellite to go on the same launch vehicle. **Mr Terán** expressed similar views.

8.5 **Mr Kibe**, **Mr Bin Hammad**, **Mr Koffi**, **Mr Magenta** and **Mr Ito** supported the previous speakers. So too did **Mr Hoan**, who noted the parallels between the case now before the Board and that of Viet Nam's VINASAT network discussed by WRC-07, where the conference had mandated the Board to grant an extension if co-passenger-related delays made it necessary.

8.6 **Mr Strelets** said that the WRC had made it clear that the Board could and in fact should grant extensions to regulatory time-limits when co-passenger issues caused delays. The Board could base its decision solely on that consideration.

8.7 The **Chairman** suggested that the Board conclude as follows:

"The Board considered the request from the Administration of Papua New Guinea as presented in Documents RRB16-3/2 and RRB16-3/2(Add.1). The Board noted that a delay was caused due to a problem related to a co-passenger issue, which qualified this request for consideration within the mandate of the Board based on the decisions of WRC-07. The Board decided to agree to the request of the administration and to grant an extension of four months of the regulatory time limit for bringing into use the frequency assignments to the NEW DAWN 21 satellite network at 60°E to 31 December 2016."

8.8 It was so **agreed**.

9 Submission by the Administration of Israel requesting an extension of the regulatory time-limit to bring into use the AMS-CK-17E satellite network (Document RRB16-3/6)

9.1 **Mr Matas (Head SSD/SPR)** introduced Document RRB16-3/6, containing a request by the Administration of Israel for extension of the regulatory deadline for bringing into use the AMS-CK-17E satellite network at 17°E. The request was based on a *force majeure* event, namely the pre-launch explosion of the SpaceX Falcon 9 rocket on 1 September 2016, which had completely destroyed the AMOS-6 satellite due to be launched on 3 September 2016. He noted that the regulatory deadline for bringing into use the AMS-CK-17E satellite network was 28 March 2017, and that a previous *force majeure* event had affected frequency assignments at 17°E when the AMOS-5 satellite had failed (§ 8 of Document RRB16-2/15 - Minutes of the 72nd meeting of the Board).

9.2 **Mr Ito** said that he had been saddened to hear of the loss of the AMOS-6 satellite in what was evidently a *force majeure* event. The request by the Administration of Israel was legitimate, and the Board should grant a qualified and limited extension of the deadline for bringing into use the

AMS-CK-17E satellite network at 17°E. It appeared from Document RRB16-3/6 that, having brought into use the frequency assignments at 17°E, AMOS-6 was to have been positioned at 4°W. If in future the Board were to receive a request for the extension of a regulatory deadline in regard to 4°W on the basis of the same *force majeure* event, then the Board would have to consider the question of whether a single *force majeure* event could properly be the basis for extension of deadlines at two or more orbital positions.

9.3 **Mr Strelets** recalled that, in its work under Resolution 80, the Board had taken a dim view of satellite hopping. The document from the Administration of Israel showed an intent to hop, and thereby challenged the Board's opinion. He asked whether any due diligence information under Resolution 49 was available on the intended use of the 17°E orbital position by the AMOS-6 satellite. At its 72nd meeting, the Board had agreed to extend by one year the regulatory deadline for bringing back into use frequency assignments at 17°E affected by the failure of AMOS-5. If the Administration of Israel had difficulties with the Ka band, then it should submit to the Bureau a new notice for frequency assignments in the Ka band at orbital position 17°E.

9.4 **Mr Hoan** expressed sympathy for Israel on the total loss of the AMOS-6 satellite because of the explosion of the SpaceX Falcon 9 rocket. He nevertheless had the same concern as Mr Ito in regard to extending the regulatory deadline for two orbital positions on the basis of one *force majeure* event, and wished to raise the same question as Mr Strelets on Resolution 49 information for AMOS-6 at 17°E. It seemed that there was Resolution 49 information for AMOS-6 only at 4°W.

9.5 **Mr Bessi** supported the comments made by Mr Strelets and Mr Hoan. The Board should base its decision on a careful analysis of the situation arising from the fatal in-orbit anomaly that had befallen the AMOS-5 satellite on 21 November 2015, as well as the *force majeure* event that had destroyed the AMOS-6 satellite. The AMOS-17 satellite was intended to replace AMOS-5 but no documentation had been provided on AMOS-17, in particular regarding the launch service. Furthermore, AMOS-6 had been intended for 4°W, but the Administration of Israel stated that the satellite would have been positioned at 17°E for three months. The Board had to be cautious in dealing with the request by the Administration of Israel in order to avoid setting an undesirable precedent.

9.6 **Ms Wilson** recalled the discussion of satellite hopping at WRC-15 but noted that the conference had not changed the regulations in that respect. Thus nothing that Israel had intended to do was inappropriate in terms of the Radio Regulations. Two satellites had been lost, but the *force majeure* event impeding the bringing into use of frequency assignments at 17°E had been the publicly visible explosion of the Falcon 9 rocket. She was in favour of granting the extension requested by the Administration of Israel.

9.7 **Mr Khairov** supported the views expressed by Ms Wilson. Placing a replacement satellite in an orbital position to bring frequency assignments into use in no way violated the provisions of the Radio Regulations. If the due diligence information for AMOS-5 and AMOS-6 confirmed capacity for the AMS-CK-17E satellite network frequency assignments, then the Board should respond favourably to the request from the Administration of Israel.

9.8 **Mr Henri (Chief SSD)** explained that several satellite networks would operate at 17°E: the INTERSPUTNIK-17E, INTERSPUTNIK-17E-CK and INTERSPUTNIK-17E-B networks in the C, Ku FSS unplanned and Ku BSS Plan frequency bands, and the AMS-CK-17E network in several frequency ranges including the Ka band. Following the loss of AMOS-5, the Board had granted an extension for the bringing back into use of the INTERSPUTNIK networks. The AMS-CK-17E network was a new network, for which the Administration of Israel had until 28 March 2017 to submit notification and due diligence information and more importantly to bring into use the frequency assignments. According to the information already provided by the Administration of Israel, AMOS-6 had been planned to bring into use in particular the Ka band frequency assignments of the AMS-CK-17E network at 17°E prior to moving to 4°W, its designated orbital slot. As Ms Wilson had pointed out, the use of one space station for a short period to bring frequency assignments at a different orbital position into use was in conformity with the Radio Regulations and decisions of

WRC-15 on this issue. In that context, Resolution 40 (WRC-15) simply required administrations to provide information on the last orbital position, associated satellite network (or networks) and date on which the space station was no longer maintained at the orbital location, in case of a space station previously used at a different orbital position.

9.9 **Mr Strelets** said that Document RRB16-3/6 was unclear. He understood from informal consultations with the Bureau that the AMS-CK-17E satellite network comprised the C, Ku, Ka and X bands. Yet in the last paragraph of the document, the Administration of Israel simply requested an extension of the regulatory deadline for bringing into use the AMS-CK-17E satellite network, without specifying which bands were concerned. Was the Board to infer that the request covered all bands? Were two extensions to be granted at orbital position 17°E as a result of two *force majeure* events, one related to AMOS-5 and the other to AMOS-6?

9.10 **Mr Henri (Chief SSD)** confirmed that the AMS-CK-17E satellite network contained the C, Ku, Ka and X bands. He understood the request may concern all bands, but more particularly the Ka band.

9.11 **Ms Wilson** observed that the AMS-CK-17E satellite network was a different network from those considered by the Board at its previous meeting. Furthermore, it seemed from the fourth paragraph of Document RRB16-3/6 that the extension request from the Administration of Israel concerned only the bringing into use of the Ka band. No request was being made in regard to the 4°W orbital position.

9.12 **Mr Bessi**, supported by **Mr Magenta**, said that, along with clarifying whether the request from the Administration of Israel concerned only the Ka band or all the bands of the AMS-CK-17E satellite network, it would be helpful for the Board to understand the relationship between the AMOS-17 satellite, the INTERSPUTNIK satellite networks and the AMS-CK-17E satellite network, and whether the anomaly that had befallen the AMOS-5 satellite constituted a *force majeure* event in regard to the AMS-CK-17E satellite network. The regulatory deadline for bringing into use the AMS-CK-17E satellite network was 28 March 2017 and the Board's next meeting would be held in February 2017. Perhaps the Administration of Israel could be asked to provide further details and the Board could decide on the matter at its next meeting.

9.13 **Ms Wilson** drew attention to the penultimate paragraph of the document, in which the Administration of Israel stated that "The RRB approval of our current request is essential in order to avoid loss of the Israeli Administration's regulatory rights under the AMS-CK-17E satellite network, and to allow the satellite operator to include a Ka-band payload on the replacement satellite at 17°E". She proposed that the Board should grant the requested extension solely for the Ka band and leave it to the administration to request extension for other bands if it so wished, taking account of the points raised by Mr Bessi.

9.14 **Mr Hoan** recognized that the loss of the AMOS-6 satellite clearly met the conditions for *force majeure* in regard to the 4°W orbital position. Given that no Resolution 49 due diligence information had yet been provided for the filings at 17°E, however, it was not clear that the *force majeure* conditions were fulfilled for that orbital position. He supported the views expressed by Mr Bessi and said that the Board should take up the matter at its next meeting on the basis of further details to be provided by the Administration of Israel.

9.15 **Mr Koffi** agreed with Ms Wilson that the request by the Administration of Israel related to the bringing into use of the Ka band for the AMS-CK-17E satellite network at 17°E. Nevertheless, in view of the comment by Mr Henri (Chief SSD), he could agree with Mr Bessi that the Board should defer its decision until its next meeting, in order to get further details from the Administration of Israel.

9.16 **Mr Bin Hammad** said that it was important for the Board to study and analyse requests for granting extensions to regulatory deadlines, and to reach consensus on any extension. The doubts of a single member of the Board could lead to clarification for many Board members. It would be better

for the Board to discuss the request from the Administration of Israel at its next meeting on the basis of further details to be provided by the administration.

9.17 **Mr Khairov** said that it seemed clear that Israel had been struck by two *force majeure* incidents and was taking all possible steps to keep its assignments. If the Board were to defer the matter to its next meeting, then Board members who wanted further information would have to specify the details to be provided.

9.18 **Ms Wilson** emphasized that delaying the Board's decision would not be without cost to Israel. In the penultimate paragraph of the document, the administration stated that the decision was "particularly urgent for the satellite operator to be able to move forward with the satellite design freeze and execution of the replacement satellite project at 17°E". The request from the Administration of Israel concerned the bringing into use of a new assignment (not the bringing back into use of an assignment). Among the various frequency bands mentioned in the document, the only new assignment was in the Ka band for the AMS-CK-17E satellite network.

9.19 **Mr Strelets** said that, apart from the matter of satellite hopping, he could agree with Ms Wilson in regard to the Ka band assignment of the AMS-CK-17E satellite network. It would be unacceptable, however, to extend the regulatory deadline for frequency assignments in the other bands for the AMS-CK-17E satellite network, as the Administration of Israel suggested in the final paragraph of the document.

9.20 **Mr Magenta**, responding to the comments made by Ms Wilson and Mr Khairov, said that various points needed to be clarified, and that design studies could go ahead even if the Board delayed its decision for three months.

9.21 **Mr Henri (Chief SSD)** explained that the seven-year regulatory period for the frequency assignments in the C, Ku, Ka and X bands for the AMS-CK-17E satellite network would end on 28 March 2017. Unless the administration sent notification and due diligence information, and had a satellite that could bring the assignments into use, the filings would be cancelled. In Document RRB16-3/6, the Administration of Israel focused on the Ka band.

9.22 **Ms Wilson** noted that the AMOS-17 satellite was intended to bring back into use the suspended assignments of the INTERSPUTNIK networks, as well as to bring into use the Ka band assignments of the AMS-CK-17E satellite network.

9.23 **Mr Strelets** agreed with Ms Wilson's remark but said that agreeing to extend the regulatory deadline for the Ka band in response to Israel's request would be contrary to previous decisions of the Board in which the Board had refused to accept the use of a single satellite to bring into use two orbital positions.

9.24 **Mr Ito** said that in the present case the Board should agree to extend the regulatory deadline for the Ka band on the grounds of *force majeure*. Provided that the terms of No. 11.44B were complied with, namely deployment of a space station with the capability of transmitting or receiving the frequency assignment at the notified orbital position for a continuous period of ninety days, the use of a single satellite to bring into use multiple orbital positions was legitimate. He nevertheless reiterated his concern about the possible future use of a single instance of *force majeure* to seek extension of the regulatory deadlines for several orbital positions.

9.25 **Mr Khairov** said that the Board had to examine each case individually. In the present case, Israel was reacting to two *force majeure* incidents, and was being open about its intended use of a satellite to bring into use its assignment at 17°E prior to moving the satellite to 4°W. A negative decision by the Board might encourage other administrations to be more secretive in the future. He said that the Board should agree to the requested regulatory extension for the Ka band and ask for further information as a basis for considering the other bands at its next meeting.

9.26 **Ms Wilson** supported the views expressed by Mr Ito and Mr Khairov.

9.27 **Mr Bessi** and **Mr Magenta** reiterated that it would be preferable to request further information in order to clarify the matter, and defer the Board's decision until its next meeting.

9.28 **Ms Wilson** and **Mr Khairov** considered that a delay by the Board in taking a decision would be prejudicial to the AMOS-17 satellite project.

9.29 **Mr Strelets** recalled that in adopting Resolution 40, WRC-15 had considered that "the use of the same space station to bring frequency assignments to geostationary-satellite networks located at different orbital locations into use within a short period of time could lead to inefficient use of spectrum/orbit resources". In the past, members of the Board had expressed the view that the use of one space station to bring frequency assignments at different orbital positions into use within a short period of time was not the intent of the regulations. WRC-15 had not contradicted that view.

9.30 **Mr Ito** recalled that prior to WRC-12 the Board had discussed the abusive use of satellite hopping, with some administrations claiming that assignments had been brought into use after a period of just a few days. The Board had raised its concern to WRC-12 and the conference had set the minimum period of ninety days.

9.31 **Mr Bessi** said that the conference had given the Board the authority to grant extensions to regulatory deadlines on the basis of *force majeure*. In order to grant an extension for the Ka band, the Board would have to accept the existence of *force majeure*. The Board should be circumspect in examining the scope of the *force majeure* argument, bearing in mind the possibility that the administration might request extensions for other bands as well. The Board had to assume responsibility for taking the correct decision and should do so on the basis of full information.

9.32 **Mr Hoan**, **Mr Magenta**, **Mr Koffi** and **Mr Bin Hammad** spoke in favour of seeking further information and deferring the Board's decision until its next meeting.

9.33 **Mr Strelets** emphasized that the Board should reach consensus on its decision.

9.34 The **Chairman** said that if the Board were to seek further information, then it should specify precisely what information was lacking. She invited Board members who so wished to forward their questions to Mr Strelets, who had volunteered to coordinate a list of questions.

9.35 **Mr Strelets** subsequently submitted the following list of proposed questions, to which Mr Magenta, Mr Bessi and he himself had contributed:

"1. At the 72nd meeting the RRB considered the submission from the Administration of the Russian Federation relating to a situation of force majeure which occurred with the AMOS-5 satellite at orbital position 17°E and resulted in total loss of this satellite. The Board decided to grant the Administration of the Russian Federation a one year extension of the time limit for bringing back into use the frequency assignments to the INTERSPUTNIK-17E, INTERSPUTNIK-17E-CK and INTERSPUTNIK-17E-B satellite networks until 21 November 2019 (frequency bands 3 400-4 200 MHz/5725-6725 MHz; 10.95-11.20 GHz, 11.45-11.70 GHz, 12.50-12.75 GHz/13.75-14.5 GHz; 11.70-12.50 GHz/14.50-14.80 GHz, 17.30-18.10 GHz). *Question*: Does the Administration of Israel consider that the question of future use by the AMOS-17 satellite in an orbital position 17°E of FSS non-planned bands C and Ku and BSS planned Ku band is closed?

2. RRB would like to ask Israel to present the documents confirming the plans to put AMOS-6 satellite to an orbital position 17°E before placement of this satellite in the declared position 4°W.

3. On the AMOS-5 satellite there were no repeaters in the Ka band. Consequently, the RRB understanding is that in case of further work of AMOS-5 in an orbital position 17°E the frequency assignments of satellite network AMS-CK-17E in the range of Ka would be removed from the MIFR on March 28, 2017.

4. How can the loss of the AMOS-6 satellite, which was intended to operate in the position 4°W, justify the application of Force Majeure at position 17°E?

5. Which bands have been coordinated for AMS-CK-17E?

6. Does the Administration of Israel plan to suspend the use of frequency assignments of the satellite network in an orbital position 4°W?

7. What was the date for the bringing into use of the satellite AMOS17E? Is the satellite ready? If not, when will it be ready?

8. Why the approval of the extension of the Ka-band is linked to the operator works?"

9.36 **Ms Wilson** said that, in reviewing the questions, the Board should ascertain both that it did not already have the answers and that the clarifications sought were relevant to the decision it had to take. She noted that the Board had information available not only in Document RRB16-3/6 submitted by the Administration of Israel, but also in Document RRB16-2/9 submitted to the Board's previous meeting by the Administration of the Russian Federation acting as notifying administration for INTERSPUTNIK. Turning to the list of proposed questions, she said that the first question related to the frequency bands of the INTERSPUTNIK satellite networks. The Board did not need that information in regard to its decision in the case before it. The second question, regarding plans to position the AMOS-6 satellite at 17°E prior to moving it to its declared orbital position of 4°W, was relevant but had already been answered by the Administration of Israel, and the Board's practice was to believe information submitted by administrations. The third question concerned AMOS-5 and the Board already knew the answer. The fourth question related to the second question. The fifth, sixth and eighth questions were not relevant to the Board's decision, and the seventh question was unclear.

9.37 **Mr Strelets** said that some members of the Board wished to have further information, and it had never been the Board's practice to limit the questions that its members could raise. Whether or not the questions were sent to the Administration of Israel, they would in any case appear in the minutes of the meeting.

9.38 **Mr Bessi** said that answers to the first three questions would provide the Board with useful additional information. Perhaps the Bureau could provide answers on the basis of available data, and the Board could consider the matter and defer its decision until its next meeting.

9.39 **Mr Henri (Chief SSD)** said that, in the opinion of the Bureau, the document submitted by the Administration of Israel was clear enough. If so requested, the Bureau could provide answers to all the questions raised, although members of the Board might want fuller information than that currently available.

9.40 Following further discussion which failed to produce consensus either on the list of questions or on the procedure for bringing the questions to the attention of the Administration of Israel, **Ms Wilson** again emphasized that the request from the Administration of Israel was based on *force majeure* and she urged Board members to consider the four conditions that had to be fulfilled. In her view, the loss of AMOS-6 would cause the Administration of Israel to fail to bring into use the AMS-CK-17E satellite network Ka band. Thus, the fourth condition (a causal effective connection between the event and the failure to fulfil the obligation) was met, but only for the case of bringing into use the Ka band frequency assignment at 17°E. The only extension of the regulatory deadline that the Board was allowed to grant on the basis of *force majeure* in regard to the AMS-CK-17E satellite network at 17°E therefore related to the Ka band solely.

9.41 The **Chairman** suggested that the Board conclude as follows:

"The Board considered very carefully the request from the Administration of the State of Israel contained in Document RRB16-3/6. The Board reiterated that any decisions to extend the regulatory time-limit to bring frequency assignments into use would be based on the specific merits of each request and in line with the decisions and instructions of the WRC. The Board concluded that the case fulfilled the conditions of *force majeure* associated with the loss of the AMOS-6 satellite. Taking into consideration all aspects of the request, the Board decided to grant an extension for a period of three years of the regulatory time limit for the bringing into use of frequency assignments in the Ka-band to the AMS-CK-17E satellite network."

9.42 It was so **agreed.**

10 Submission by the Administration of France concerning a request for an extension of the regulatory time-limit for the bringing into use of frequency assignments to the F-SAT-N-E-70.5E satellite network in the 30/20 GHz range (Document RRB16-3/10)

10.1 **Mr Matas (Head SSD/SPR)** introduced the French Administration's request in Document RRB16-3/10 for an extension to 7 August 2019 of the regulatory time-limit for bringing into use the Ka-band frequency assignments to the F-SAT-N-E-70.5E satellite network following total failure of the satellite's solar panels, obliging the operator to de-orbit definitively the satellite just nine days short of expiry of the ninety-day period of operation required under No. 11.44B to confirm bringing into use of the assignments.

10.2 Responding to a question from **Ms Wilson, Mr Henri (Chief SSD)** said that the bringinginto-use deadline for the F-SAT-N-E-70.5E network had been 28 May 2016 for the Ka-band assignments concerned.

10.3 **Mr Strelets** said that to his understanding the documentation before the meeting contained a well-founded request based on *force majeure* for the extension of a regulatory time period which he would be inclined to accede to. The satellite involved had nevertheless been an old one that had been moved repeatedly from one orbital position to another, and appeared ultimately to have died a natural death. Given that it had been moved from one position to another, he asked the Bureau whether its beams corresponded to the filing whose use was being suspended.

10.4 **Mr Henri (Chief SSD)** said that even though beams were pre-configured for optimum operation at certain positions, their technology allowed them to be reconfigured for use at other orbital positions. It could thus be assumed that the EUTELSAT 70D satellite being used to bring the Kaband F-SAT-N-E-70.5E satellite network assignments into use had been able to cover the service areas in the filing.

10.5 **Mr Bessi** said that the assignments in question appeared to have been brought into use by the relevant deadline of 28 May 2016, but the satellite used had broken down during the ninety-day bringing-into-use period. It further appeared that the conditions for *force majeure* were met. He therefore saw no reason not to grant the three-year extension requested.

10.6 **Mr Khairov** said that he too saw no reason not to accede to the French Administration's request, which met the conditions for *force majeure*. The Board might consider developing a rule of procedure to cover such cases which, though rare, could involve abuse. It would be useful for administrations and operators to have guidelines on the extent to which satellites could be moved from one position to another and still be considered to be operating effectively.

10.7 **Mr Koffi** said that based on the arguments put forward by France, he could accede to the request on the grounds of *force majeure*. He nevertheless wondered what should have been the expected lifetime of the satellite concerned.

10.8 **Mr Magenta** said that he too was in favour of acceding to the French Administration's request, which appeared to have involved an unforeseeable breakdown.

10.9 **Ms Wilson** said that she was struggling to accept that the breakdown of a 14-year-old satellite was totally unpredictable.

10.10 The **Director** said that in his experience a satellite could be expected to have a stationkeeping lifetime of at least 15 years. When breakdowns occurred, they were usually equipment failures for which back-up replacements had been foreseen – for example, transistors and the like. He had never witnessed the total failure of solar powers, which he would term a system failure rather than an equipment failure, and which could not be corrected. 10.11 **Mr Terán** said that he shared the same concerns as Ms Wilson, but found the Director's comments helpful. The Board must nevertheless be careful not to unreservedly accept equipment failure as grounds for *force majeure*. **Ms Wilson** agreed.

10.12 **Mr Magenta** said that he too found the Director's explanation useful. In his own experience, the lifetime of a satellite was related more to its control and management than to its equipment or age – for example, meteorite events were far more decisive than equipment events. The request submitted by France clearly fulfilled all the conditions to be met for *force majeure*, and he therefore confirmed his view that the Board should accede to it.

10.13 **Mr Strelets** said that Ms Wilson and Mr Terán had raised interesting points, and he noted that the Radio Regulations clearly covered the destruction of a satellite prior to bringing into use. Nevertheless, the French Administration had complied with the provisions of the Radio Regulations to the letter, its case met the conditions for *force majeure*, a satellite had clearly been in orbit and operational at the position concerned, and France had not sought to hide the fact that its satellite had fallen nine days short of fulfilling the ninety-day bringing-into-use requirement. Thought might have to be given to how long a satellite had to be in orbit in order for the concept of *force majeure* to be applicable; however, it was up to the WRC rather than the Board to decide the relevant periods. In the present case, while understanding the concerns raised, he was satisfied that the Radio Regulations covered the destruction of a satellite and that therefore the Board could accede to the French Administration's request.

10.14 **Mr Henri (Chief SSD)** said that, had the French Administration sought to hide the fact that it had fallen nine days short of fulfilling the ninety-day bringing-into-use requirement, satellite tracking would soon have prompted the Bureau to ask questions. He nevertheless confirmed that based on the information available to him satellite EUTELSAT 70D had been in perfect working order when it had taken up operation at 70.5°E and could be assumed not to have reached the end of its operational lifetime by any means. He knew of only two other cases of total failure of solar panels in the past, at least in so far as commercial satellites were concerned.

10.15 **Ms Wilson** said that with the explanations provided by the Director and Mr Henri (Chief SSD), she too could agree to accede to the French Administration's request on the grounds of *force majeure*.

10.16 The **Chairman** suggested that the Board conclude as follows:

"The Board considered the request from the Administration of France, contained in Document RRB16-3/10, for an extension of the regulatory time-limit for the bringing into use of frequency assignments to the F-SAT-N-E-70.5E satellite network in the 30/20 GHz range. The Board reiterated that any decisions to extend the regulatory time-limit to bring frequency assignments into use would be based on the specific merits of each request and in line with the decisions and instructions of the WRC. The Board concluded that the case fulfilled the conditions of *force majeure* and particularly noted that the total failure of the solar panels of a satellite was confirmed by the Bureau as being a very rare event. Taking into consideration all aspects of the request, the Board decided to grant an extension of the regulatory time limit for the bringing into use of frequency assignments in the bands 29.5-29.678 GHz/19.7-19.878 GHz to the F-SAT-N-E-70.5E satellite network until 7 August 2019."

10.17 It was so **agreed**.

10.18 **Ms Wilson** said that, although she could readily support the decision taken by the Board on the present case, she would not like the decision to be taken as a precedent in the examination of future cases of requests for extensions based on *force majeure* involving old satellites.

10.19 **Mr Strelets** said that he understood Ms Wilson's concern, but noted that it would be difficult to establish regulatory provisions dealing with the question, since the lifetimes of satellites could vary considerably depending on numerous factors, and what was considered the normal lifetime for a satellite some years ago might well seem short now.

- 11 Request for a decision by the Radio Regulations Board for cancellation of frequency assignments in the band 3 702 6 420.5 MHz to the NIGCOMSAT-1R satellite network under No. 13.6 of the Radio Regulations (Document RRB16-3/5)
- 11.1 Mr Matas (Head SSD/SPR) introduced the Bureau's request in Document RRB16-3/5.
- 11.2 The Board **agreed** to conclude on the matter as follows:

"The Board examined the request from the Bureau for a decision for the cancellation of frequency assignments in the frequency band 3 702-6 420.5 MHz to the NIGCOMSAT-1R satellite network under RR No. **13.6** as contained in Document RRB16-3/5. The Board considered that the Bureau had applied the relevant provisions of the Radio Regulations correctly and agreed to the cancellation of frequency assignments in the frequency band 3 702-6 420.5 MHz to the NIGCOMSAT-1R satellite network under RR No. **13.6**."

12 Submission by the Administration of Papua New Guinea requesting a decision from the Radio Regulations Board to reinstate the Part B and notification filings of the AFRISAT 3W-PKU satellite network (Document RRB16-3/7)

Mr Wang (Head SSD/SNP), introducing Papua New Guinea's request in Document 12.1 RRB16-3/7, outlined the details of the case, which were also set out in the letter dated 23 September 2016 from the Administration of Papua New Guinea to the Director of BR. Papua New Guinea based its request for reinstatement of the Part B filing for the AFRISAT 3W-PKU satellite network on the grounds that it had complied with the provisions of § 6.6 of Appendix 30B, and stated that: "Specifically, the administration of Papua New Guinea sought the agreement of affected administrations under No. 6.6 of Appendix 30B, which is the only requirement of this provision of the ITU Radio Regulations. There is nothing in the Radio Regulations or the Rules of Procedure that specifies that agreements are explicitly required or how the Bureau should proceed if an administration does not provide a response." The Bureau's understanding of the provisions in question differed from Papua New Guinea's: the agreement of affected administrations under § 6.6 had to be explicit, and that approach had been applied throughout the years in the implementation of Appendix 30B, notwithstanding the numerous changes that had been made to the appendix by different conferences. Indeed, it was borne out by WRC-07 documentation dealing with principles associated with the implementation of Appendix 30B, in particular documentation produced by WRC-07 Working Group 5B. Thus, the basic question to be addressed by the Board in response to the case now before it was whether or not the agreement of affected administrations under § 6.6 had to be explicit.

12.2 **Mr Ito** commented that Papua New Guinea's approach to implementation of the provisions in question appeared to involve the assumption of tacit agreement based on affected administrations' failure to reply within four months. The issue of tacit agreement always raised problems and had been discussed at length at WRC-15. The key word in § 6.6 was "seek", giving rise to the question, which he addressed to the Bureau, of whether Papua New Guinea had diligently sought the agreement of the 185 countries and geographic areas included in the service area of its network.

12.3 **Mr Strelets** said that the issue was extremely complex, involving the difference between seeking agreement and actually obtaining it explicitly, as explained in § 6 of the Director's report to the present meeting (Document RRB16-3/3). The rights of administrations were directly affected both in the event of the territory of an administration being included in the service area in the absence of a response, and in the event of the territory of an administration being excluded from the service area in the absence of a response. He also questioned why the Administration of Papua New Guinea had not received the assistance it had requested under No. 13.1

12.4 Responding to the questions asked, **Mr Wang (Head SSD/SNP)** said that Papua New Guinea had sent correspondence to numerous administrations identified under § 6.6, seeking their agreement. Regarding assistance, he said that when Papua New Guinea had initially sought the Bureau's

assistance, the Bureau had understood the request was made under §§ 6.13-6.15 of AP30B, and had responded that assistance under those provisions was not applicable to the seeking of agreements under § 6.6. Only subsequently had Papua New Guinea invoked § 13.1, further to which the Bureau had requested Papua New Guinea to provide a list of administrations identified under § 6.6 but did not give response to request for seeking agreement. The Bureau had also reminded Papua New Guinea of the nineteen administrations that had objected to the inclusion of their territory in the service area of its network based on their comments on Special Section AP30B/A6A/154. He stressed that a general distinction must be drawn between agreements relating to interference on one hand, regarding which either tacit or explicit agreement might apply, and agreement relating to inclusion in a service area on the other, for which explicit agreement was required.

12.5 **Mr Khairov** said that he had sympathy for Papua New Guinea's case, and it was logical not to encourage inaction on the part of administrations, which should be monitoring notices in regard to service areas. Nevertheless, the provisions of the Radio Regulations had to be adhered to, and according to his reading of the various provisions of Article 6 of Appendix 30B and § 6.17 in particular, agreement had to be obtained from affected administrations in the case under consideration. The issue could usefully be submitted to the WRC for consideration; but as things stood, the Board could not accede to the request.

12.6 **Mr Ito** said that the issue under discussion involved both the rights and duties of administrations. Administrations could ask for assistance from the Bureau, but it was their duty under § 6.6 to seek the explicit agreement of affected administrations, even if there were more than one hundred. Simply asking the Bureau for assistance did not constitute evidence of fulfilling that duty. He therefore could not agree to accede to Papua New Guinea's request.

12.7 **Mr Bessi** said that he too had sympathy for Papua New Guinea's case. According to his reading of the various provisions of Article 6, however, assistance could be requested by administration for filings under § 6.17 in regard to § 6.5 but not in regard to § 6.6. Moreover, it was insufficient for an administration to simply request agreement, such agreement had actually to be obtained. Such was the understanding of the international radiocommunication community regarding the implementation of Appendix 30B to date. He too could not agree to accede to Papua New Guinea's request.

12.8 **Mr Strelets** observed that, rather than focusing on Papua New Guinea's request, the Board should focus on clarifying the application of § 6.6 and § 6.19 of Appendix 30B in the case of non-response, as requested by the Bureau in Document RRB16-3/3. Indeed, Papua New Guinea was not the only party that had encountered the problem in hand: numerous operators would surely welcome the clarifications requested. There was no rule of procedure on the issue, nor was the Bureau's practice set down anywhere. Papua New Guinea had been quite right in requesting the Bureau for assistance on the matter under § 13.1, further to which the Bureau had turned to the Board for clarification. The Board should consider whether under § 6.6 agreement had simply to be sought, or had to be both sought and obtained.

12.9 **Mr Magenta** endorsed the comments made by Mr Khairov and Mr Strelets. The Board could only help to clarify the issue, however, by establishing one or more possible interpretations and submitting its findings to the WRC for decision, or by advising the Director to ask the WRC to clarify matters. The Board could not decide on the matter itself. Although § 6.8 and § 6.17 would seem to invalidate the approach adopted by Papua New Guinea, the consequences of an administration's failure to obtain agreement under § 6.6 were not to be found in the Radio Regulations.

12.10 **Mr Henri (Chief SSD)** said that, based on the work of its Working Group 5B, WRC-07 had agreed that explicit agreement had to be obtained in regard to inclusion in a service area. Since then – and indeed previously – the Bureau had applied that approach. In matters relating to assistance to administrations in the event of non-reply, WRC-15 had established a clear distinction between § 6.5 and § 6.6, namely that in cases of non-reply regarding coordination based on technical considerations, the notifying administration could request assistance under § 6.13 and § 6.15, whereas assistance

could not be requested under those provisions in cases of non-reply to requests regarding inclusion in service areas. In view of the numerous AP30B additional system filings treated by the Bureau with a growing number of administrations identified under § 6.6 but not responding to the seeking agreement procedure, further consideration could be given to this issue.

12.11 Having commented further on the application of §§ 6.5-6.8, including as compared with provisions in Appendix 30A, Mr **Strelets** said that any output from WRC-07 Working Group 5B could not be considered as a WRC decision if it had not been included in the final acts of the conference. There was clearly a lacuna that had to be filled, as administrations' rights were affected. A rule of procedure was called for.

12.12 **Mr Bessi** said that to his mind § 6.6 was perfectly clear that in the absence of explicit agreement from a given administration, its territory had to be excluded from the service area in question; the Board could not adopt a rule of procedure altering that provision's application. Thought might be given to the need for a rule of procedure on § 6.16.

12.13 **Mr Magenta** considered that § 6.6 was clear, and that the need for a notifying administration to both "seek and obtain" agreement under that provision was confirmed by § 6.8. Perhaps a rule of procedure on § 6.16 and § 6.17 might be needed.

12.14 **Mr Strelets** said that, notwithstanding previous speakers' comments, administrations evidently were not clear in their understanding of § 6.6, and nor were numerous operators. In particular, § 6.8 indicated that following the examination under § 6.5 and § 6.6, the Bureau shall immediately send a telegram or fax to the administration, drawing attention to the requirement to seek and obtain the agreement of those administrations identified in the special section of the BR IFIC published under § 6.7. According to his understanding, however, the requirement to seek and obtain agreement applied only to § 6.5, and only the requirement to seek agreement applied to § 6.6. The Bureau had a different interpretation. It would therefore be advisable to clarify those matters in a rule of procedure.

12.15 The **Chairman**, supported by **Mr Koffi** and **Mr Khairov**, suggested that the best way forward might be to confirm that the Bureau had applied the provisions of the Radio Regulations correctly in the present matter, and request the Bureau to develop a rule of procedure clarifying that non-response under § 6.6 meant disagreement on the part of the administration failing to respond. She suggested that the Board conclude as follows:

"The Board considered the request from the Administration of Papua New Guinea as contained in Document RRB16-3/7 to reinstate the Part B and notification filings of the AFRISAT 3W-PKU satellite network. The Board considered that the Bureau had applied the relevant provisions of the Radio Regulations correctly but expressed sympathy for administrations seeking agreement with other administrations and not receiving any reply to their correspondence. In order to address this problem and the application of No. 6.6 of Article 6 of Appendix **30B**, the Board instructed the Bureau to prepare a new draft Rule of Procedure on the basis that no response received on requests under No. 6.6 would mean disagreement. The Board further instructed the Bureau to circulate the draft Rule of Procedure to administrations for consideration at the 74th meeting. The Board further decided not to accede to the request from the Administration of Papua New Guinea."

12.16 It was so **agreed**.

13 Submission by the Administration of Qatar on the examination of the F-SAT-N5 satellite networks (B1FR transmit beam) (Documents RRB16-3/8 and RRB16-3/DELAYED/1-3)

13.1 **Mr Matas (Head SSD/SPR)** introduced Documents RRB16-3/8 and RRB16-3/DELAYED/1 from the Administration of Qatar concerning the examination of the F-SAT-N5 satellite networks (B1FR transmit beam), Document RRB16-3/DELAYED/2 from the Administration of France in response to those documents, and Document RRB16-3/DELAYED/3

from the Administration of Qatar responding to the document from France. The matter concerned satellite networks submitted by the Administration of France in the new FSS allocation approved by WRC-15. The Administration of Qatar had examined the "as received" data for the B1FR transmit beam using the GIBC software tool, resulting in unfavourable findings. When the networks had been formally published in BR IFIC 2823, however, the findings had been favourable. The Administration of Qatar asked the Board to revoke those favourable findings, noting the significant reduction in power between the "as received" and published findings. He explained that the Bureau had received the filings from the Administration of France on 29 November 2015. On 7 December 2015, before starting its formal examination of the filings, the Bureau had received a letter from France pointing out a human error in the submitted data. On 5 January 2016 the Bureau had made the "as received" data available in BR IFIC 2810, not incorporating the correction made by France, and the Administration of Qatar had sent a complaint on 26 July 2016.

13.2 The **Director** said that the request from the Administration of Qatar was surprising, given that "as received" data had no regulatory status. The practice of making "as received" data available had started at a time when there had been a significant backlog in the Bureau for processing filings, and had been a way to flag projects and alert administrations.

13.3 **Mr Matas (Head SSD/SPR)** added that Resolution 55, under which the Bureau had to make coordination requests and notifications available "as received" within 30 days of receipt, had originally been adopted by WRC-2000 at a time when the Bureau was dealing with 1600 networks and there had been a three-year delay. The information was copied and made available as originally received, untouched by the Bureau. The information was subsequently checked for correctness and examined by the Bureau, and officially published in a BR IFIC. The Bureau had attempted to explain that process to the Administration of Qatar.

13.4 **Mr Strelets** expressed confidence in the Director and Bureau to always abide by and be guided by the Radio Regulations. Nevertheless, the matter raised by Qatar was sensitive. Since WRC-15, a number of administrations had practically blocked the possibility for other administrations to use frequency bands re-allotted to FSS. The Board had discussed the receivability of notices in those frequency bands at great length. It was unfortunate that the Bureau had not been more open about the communication from France identifying the error.

13.5 **Mr Bessi** noted that the letter from the Bureau dated 22 September 2016 mentioned assistance. He asked whether the Administration of France had asked for assistance and whether the Bureau had helped to detect the error. He further asked whether the data provided by France had been examined in accordance with No. 21.16 of the Radio Regulations and the associated rule of procedure. Finally, noting that 28 November 2015 had been the last day of the conference, and that France had sent a modification on 7 December 2015, he asked what data the Administration of Qatar had used for its first simulation.

13.6 **Mr Matas (Head SSD/SPR)** confirmed that the Bureau had not provided assistance to France, and that the letter identifying the error had been sent voluntarily and spontaneously by the French Administration. The corrected filings had been published in BR IFIC 2823 on 5 July 2016, and had received favourable findings. The Administration of Qatar had carried out its first simulation on the uncorrected "as received" data. The exchange of comments between the Administration to await the official publication but had declined to show Qatar the correspondence from France. He noted that Council Decision 482 allowed administrations to withdraw a filing within 15 days of the receipt of the filing, removing the obligation to pay the cost recovery fee. The decision gave administrations the flexibility to revise their filings during the 15-day period, and it was not uncommon for administrations to take advantage of such flexibility to correct errors.

13.7 **Mr Henri (Chief SSD)** observed that correspondence between an administration and the Bureau was treated confidentially and bilaterally. If a third administration raised a question, then the Bureau invited that administration to get in touch with the administration concerned.

13.8 Following comments by **Mr Strelets** and **Mr Bin Hammad** on the need for transparency, in particular with regard to the communication by the Administration of France dated 7 December 2015, the **Chairman** said that the Bureau should make the e-mail concerned available to any member of the Board who wished to see it.

13.9 **Ms Wilson**, referring to the documents submitted by the Administration of Qatar, said that the specific frequency bands were irrelevant to the matter before the Board. The Administration of Qatar had used the "as received" data and then complained that the published information had produced different findings. She could not imagine a process in which human error could not be corrected and was not persuaded to support the request by the administration.

13.10 **Mr Ito** asked why the information in the letter from the Bureau dated 12 August 2016 had not been included the Bureau's first response to Qatar. Perhaps the matter need never have been brought to the Board.

13.11 **Mr Bin Hammad** said that there might have been some misunderstanding between the Bureau and the administration, with a lack of clarity giving rise to a feeling of unfair treatment. Perhaps a way could be found to avoid such misunderstandings in the future.

13.12 **Mr Koffi** asked whether, in the absence of any regulatory basis for the request by the Administration of Qatar, the Board should be considering the matter at all.

13.13 The **Director** suggested that, given that there was no longer a backlog, suppressing the requirement to make "as received" information available would save time for administrations as well as the Bureau.

13.14 **Ms Wilson** suggested that future misunderstandings could be avoided by adding a note recommending against examining the "as received" information.

13.15 The **Chairman** suggested that the Board conclude as follows:

"The Board considered the request from the Administration of the State of Qatar on the examination of the F-SAT-N5 satellite networks (B1FR transmit beam) as presented in Document RRB16-3/8 and further considered for information Documents RRB16-3/DELAYED/1, RRB16-3/DELAYED/2 and RRB16-3/DELAYED/3. The Board did not notice any infringements of the provisions of the Radio Regulations by actions of the Bureau and noted that the Administration of France provided the corrected information in a timely manner. The Board noted that it is not recommended for administrations to use the "as received" information for examination purposes and instructed the Bureau to add such a warning to the <u>SNL Part C database</u>. Based on these considerations, the Bureau decided not to accede to the request from the Administration of the State of Qatar."

13.16 It was so **agreed**.

14 Submission by the Administration of Luxembourg requesting the revision of the examination of the LUX-30B-G4-19.2E satellite network under Articles 6 and 8 of Appendix 30B (Document RRB16-3/9)

14.1 **Mr Wang (Head SSD/SNP),** introducing the request from the Administration of Luxembourg for review of the examination of the LUX-30B-G4-19.2E satellite network in Document RRB16-3/9, drew particular attention to the Administration of Luxembourg's request under section 3 under item C.11.a in its letter dated 24 May 2016 to replace seven test points initially submitted under Articles 6 and 8 by the test points indicated in the table provided. Despite what appeared in the table, the Bureau had assumed that Luxembourg's request contained a typographical error and in fact concerned the RKG uplink and TKG downlink beams (and not the TCG beam), as the Bureau had assumed that the seven new test points were supposed to be used for the same service area of the two beams involved (uplink and downlink), and had published Luxembourg's requested change accordingly in BR IFIC 2822 of 21 June 2016. Luxembourg had reacted in its letter of 4 July 2016 by saying that the change of test points concerned only the transmitting beam, and not the RKG

receiving beam. With the new service area, however, only three of the fourteen test points of the RKG uplink beam fell inside the service area whereas 11 fell outside. Luxembourg had nevertheless insisted that for the RKG beam the Bureau should retain the three test points that fell inside the service area and ignore the eleven other test points – that being the only option available to it given that the 8-year regulatory period had been about to expire – and that the examination of the network be reviewed on that basis. The basic difficulty of the case lay in the fact that, with the change of test points, the Bureau's examination had produced an unfavourable finding, and as Part B had been submitted only two weeks before expiry of the 8-year regulatory period, Luxembourg could not make a resubmission. Responding to questions by **Mr Ito**, he said that Luxembourg had submitted the seven new test points in reaction to the fact that some administrations had not given their agreement to inclusion in the initial service area.

14.2 **Mr Ito** questioned whether an administration could say which test points should be examined and which should not. Surely if test points had been identified, they had to be examined.

14.3 **Mr Khairov** said that the Board must be very careful with the case now before it, as it involved an existing network that was operational. He asked whether test points had to be the same for both the uplink and downlink.

14.4 **Mr Wang (Head SSD/SNP)** said that the test points did not necessarily have to be the same, as there were no established provisions on the matter, but if the service area was the same for different beams, the Bureau encouraged administrations to have the same test points. The definition of "service area" in Appendix 4 referred to its identification by a set of a maximum of twenty test points and by a service area contour on the surface of the Earth or defined by a minimum elevation angle, which thus established a link between the size and shape of the service area and the locations of test points.

14.5 **Mr Khairov** asked why the Bureau, in its correspondence dated 25 April 2016, had not informed the Administration of Luxembourg that test points for the uplink also fell outside the service area. If it had done so, Luxembourg would have had time to react to the Bureau's understanding of matters and, if it had so wished, could have provided new test points.

14.6 **Mr Wang (Head SSD/SNP)** said that there was no link between the fact that two test points fell outside the service area for the downlink and Luxembourg's submission of new test points. Luxembourg had been obliged to change the service area because other administrations had not given their agreement regarding it.

14.7 Responding to a further question by **Mr Ito, Mr Wang (Head SSD/SNP)** said that, of the initial set of test points submitted, 11 fell outside the territory of other countries identified in the new service area and therefore did not have to be examined. **Mr Ito** said that to his understanding of the Appendix 30B procedures, administrations could not simply indicate that they did not wish test points to be examined if it didn't suit them. Surely all test points had to be examined.

14.8 **Mr Strelets** noted that a considerable period of time (almost 6 months) had elapsed between Luxembourg's submission of 11 November 2015 and the Bureau's reaction to it requesting clarifications, thus giving the Luxembourg Administration too little time to rectify the situation. He wondered why the Bureau had not reacted sooner. That provided further evidence that the Bureau was overburdened. Perhaps the Bureau could have been a bit more helpful in dealing with Luxembourg's submission, especially given that it involved an existing, operational network. The Plans and Master Register must reflect the actual situation in space, and the Board's decision on the present case must endeavour not only to resolve this particular case but also to ensure that similar problems did not arise again in the future.

14.9 **Mr Bessi** said that the case before the Board appeared essentially to involve a problem of communication between the Bureau and the Luxembourg Administration.

14.10 The **Chairman** agreed with Mr Bessi, and said that, as pointed out by Mr Wang (Head SSD/SNP), the basic problem was that the Luxembourg Administration had run out of time to rectify

the situation within the regulatory time period. One solution might therefore be to extend the regulatory time period, although that might not be within the Board's authority.

14.11 **Mr Khairov** said that in his view the unfavourable finding issued regarding Luxembourg's network had come as the result of incorrect action by the Bureau in the assumptions it had based its calculations on, in particular regarding the RKG uplink beam. The Board might usefully focus on that aspect in seeking to resolve the issue.

14.12 **Mr Kibe** suggested that, although the Board could not extend the applicable regulatory time period, Luxembourg might be allowed to resubmit its modification while retaining the date of the initial filing.

14.13 **Mr Bessi** suggested that one solution might be to request the Bureau to review its examination under § 6.17 of Appendix 30B, only taking into account the test points in the countries as requested by Luxembourg.

14.14 **Mr Wang (Head SSD/SNP)** said that the Bureau would have no problem effecting the relevant calculations even if it took account of only one test point initially submitted by Luxembourg. However, questions of principle arose, in that the location and distribution of test points should properly represent the service area: among the initial test points, only three test points located inside countries in Europe, whereas in fact on the territories of several countries in both the Middle East and Africa would have no test point fell within it. Issues of workload also arose, in that if the Part B publication was revised the Bureau would have to reprocess all the networks processed in the interim. It might be worth noting that Luxembourg had two other entries in the List and MIFR at 19.2°E that could probably support the operation of Luxembourg's network under discussion.

14.15 **Mr Ito** said that the Board could not simply accede to Luxembourg's request to change its network's finding from unfavourable to favourable, as that could open the door to abuse. Administrations would assume they could ask the Bureau not to examine certain test points, or indeed only submit the test points they wanted examined. Perhaps the only way forward would be to pursue Mr Kibe's proposal, instructing the Bureau to continue taking the network into account pending clarification of certain points with Luxembourg.

14.16 **Mr Strelets** said that, notwithstanding the regulatory aspects under discussion, in its correspondence Luxembourg put forward some convincing arguments which the Board had not really considered, relating for example to the versions of software that should have been applicable to its filing under the rules of procedure on receivability and the consequences of having considered other versions applicable. Luxembourg's basic conclusion was that the Bureau should have sought clarification regarding the test points outside the service area, and if it had done so an unfavourable finding would not have been issued. The other basic problem encountered had been the time taken for the Bureau to process Luxembourg's notice, resulting in insufficient time for consultations between Luxembourg and the Bureau. An alternative to Mr Kibe's proposal would therefore be to rescind the unfavourable finding a solution that was in conformity with the Radio Regulations and inform the Board of the outcome at its next meeting. He noted that the Board could not both rescind the unfavourable finding and state that the Bureau had applied the Radio Regulations correctly.

14.17 **Mr Hoan** said that he agreed with the points made by Mr Ito, since to his understanding of item C.11.a of Appendix 4 the test points for a network had to be located within the service area. In that regard, therefore, he considered that the Bureau had applied the regulations correctly. As Mr Bessi had said, however, problems of communication had arisen, owing *inter alia* to a typographical error and the Bureau's inferences therefrom. With a real satellite involved at the orbital position concerned, the Board should tell the Bureau to help Luxembourg change the test points if no disagreement was received from the four other countries involved.

14.18 **Mr Magenta** said that two sets of calculations had been effected by the Bureau based on two different scenarios, and it was still somewhat unclear which scenario was correct and produced the

most pertinent results. The Board should tell the Bureau and Luxembourg Administration to consult with a view to reaching an understanding on the matter, and report back to the Board at its next meeting. **Mr Koffi** supported that way forward.

14.19 **Mr Henri (Chief SSD)** confirmed that the Bureau could enter into consultations with the Luxembourg Administration to confirm the exact information to be taken into account in the Bureau's calculations. If the unfavourable finding was consequently replaced with a favourable finding, the Bureau would have to reprocess all networks received since Luxembourg's one.

14.20 The **Chairman** suggested that the Board conclude as follows:

"The Board considered in detail the request from the Administration of Luxembourg as presented in Document RRB16-3/9. The Board instructed the Bureau to review the examination of the LUX-30B-G4-19.2 satellite network taking into account the clarifications received from Luxembourg in this document. The Board further instructed the Bureau to re-examine the network accordingly with no change in the date of receipt of the filing and to review the findings for the filings received subsequently that may be affected as a result of this change."

14.21 It was so **agreed**.

15 Election of the chairman and vice-chairman of the Board for 2017

15.1 Having regard to No. 144 of the ITU Convention, the Board **agreed** that Mr Khairov, Vice-Chairman of the Board for 2016, would serve as its chairman in 2017.

15.2 The Board **further agreed** to elect Mr Bessi as its vice-chairman for 2017 and thus as its chairman for 2018.

15.3 The Board **further agreed** on a preliminary basis that the Board's vice-chairman for 2017 should be from Region A.

15.4 **Mr Khairov** and **Mr Bessi** thanked their fellow Board members for the honour and trust thus placed in them, and said that they would carry out their duties to the best of their abilities.

16 Confirmation of the dates of the next meeting and meeting schedule for 2017

16.1 The Board **agreed** to confirm the dates of its 74th meeting as 20-24 February 2017 and to tentatively confirm the dates of its other meetings in 2017 as 17-21 July (75th meeting) and 6-10 November (76th meeting).

17 Celebration of the 110th anniversary of the Radio Regulations and ITU World Radiocommunication Seminar 2016

17.1 The **Director** informed the Board that the 110th anniversary of the Radio Regulations would be celebrated on the morning of 12 December 2016. All those who had contributed to the Radio Regulations over the years, including the present Board members, were invited to attend. It would obviously be good for the Board to be represented by its chairman.

17.2 The Board **agreed** that the Chairman, Ms Jeanty, would represent the Board at the celebration.

17.3 The Board **further agreed** that the Chairman would give a presentation on the work of the Board at the ITU World Radiocommunication Seminar 2016, to be held from 12 to 16 December 2016.

18 Approval of the summary of decisions (Document RRB16-3/11)

18.1 The summary of decisions (Document RRB16-3/11) was **approved**.

19 Closure of the meeting

19.1 **Mr Magenta, Mr Strelets, Ms Wilson** and **Mr Ito** took the floor to congratulate the Chairman for her very able, patient and effective handling of the Board's meetings in 2016, at which a significant amount of work had been achieved.

19.2 The **Director** thanked the Chairman and all Board members for their valuable contribution to the work of ITU, and said he looked forward to seeing them again at the celebration of the 110th anniversary of the Radio Regulations and ITU World Radiocommunication Seminar 2016, or at the Board's next meeting, in 2017.

19.3 The **Chairman** thanked the speakers for their kind words, and expressed her appreciation to everyone who had contributed to the successful outcome of the meeting. She wished Mr Khairov and Mr Bessi every success in their future roles as chairman and vice-chairman. She closed the meeting at 1750 hours on Friday, 21 October 2016.

The Executive Secretary: F. RANCY The Chairman: L. JEANTY