

To: Members of the Bureau of the UNECE Expert Group on Resource Classification

From: David MacDonald and Charlotte Griffiths

<p>Conference Calls of the Bureau of the Expert Group on Resource Classification (EGRC) 19 and 21 August 2014 FINAL MINUTES</p>

Present on 3pm BST 19 August Call:

1. David MacDonald (Chair)
2. Tunde Arisekola (NGSA)
3. Karin Ask (petroleum sector)
4. Roger Dixon (CRIRSCO)
5. David Elliott (financial reporting sector)
6. Gioia Falcone (geothermal sector and academia)
7. Jim Ross (petroleum sector)
8. Anand Sahu *representing* Narendra Verma (India)
9. Hari Tulsidas (IAEA)
10. Brad Van Gosen (USGS)
11. Claudia Wulz (EC)
12. Charlotte Griffiths (UNECE)

Observer:

1. Paul Bankes
2. Slavko Solar (EC, *supporting* Claudia Wulz)

Present on 10am BST 21 August Call:

1. David MacDonald (Chair)
2. Simplicio Caluyong *representing* Adichat Surinkum (CCOP)
3. Kjell Reidar Knudsen (NPD)
4. Jim Ross (petroleum sector)
5. Hari Tulsidas (IAEA)
6. Charlotte Griffiths (UNECE)

Apologies:

1. Fatih Birol (IEA)
2. Dan Diluzio (SPE)
3. Mucella Ersoy (Turkish Coal Enterprises)
4. Michael Lynch-Bell (Chair ex-officio)
5. John Ritter (SPEE)
6. Igor Shpurov (First Vice Chair, GKZ Russian Federation)
7. Adichat Surinkum (CCOP)
8. Danny Trotman (financial reporting sector)

Draft Agenda for Bureau Calls 19 & 21 August 2014

1. Approval of draft agenda
2. Draft minutes of Bureau calls of 24 & 25 June 2014
3. Technical Advisory Group update
 - TAG Recommendation on Uranium Bridging Document
 - TAG Recommendation on CRIRSCO Template

4. Update on Application of UNFC-2009 to Nuclear Fuel Resources
- decision on submission of Uranium Bridging Document to Committee on Sustainable Energy for endorsement
5. Update on Application of UNFC-2009 to Renewable Energy Resources
6. Update on Application of UNFC-2009 to Injection Projects
7. Guidance on environmental and social considerations
8. Education and outreach
9. Any other business
10. Timing of next meeting

Documentation:

1. Draft agenda for Bureau Calls on 19 & 21 August 2014
2. Draft Minutes of 24-25 June 2014 Bureau Calls
3. TAG Recommendation on Uranium Bridging Document
4. Uranium Bridging Document for Submission to Committee on Sustainable Energy
 - 4(a) – track changes version
 - 4(b) – clean version
5. TAG Recommendation on CRIRSCO Template
6. Minutes of TAG meeting of 12 June 2014
7. Draft ToR for Economic & Social Issues Sub-group and Discussion Note
8. List of Conferences Promoting UNFC in 2014 and 2015 (as at 12 August 2014)

Item 1: Adoption of the Agenda

Documentation: Draft agenda for Bureau Calls

1. The agenda was adopted without amendment.

Item 2: Draft Minutes of Bureau Calls of 24-25 June 2014

Documentation: Draft Minutes of Bureau Calls of 24-25 June 2014

2. The draft minutes as circulated on 7 July were approved subject to the last sentence of paragraph 51 being amended to read “During the meeting the possible use of UNFC for the storage of spent nuclear fuel was raised, as well as the need for extrabudgetary funds to support the UNFC education and outreach programme”.
3. A member raised concerns over the implication of the words “by any important part of concerned interests” in paragraph 8 relating to the definition of consensus as it pertains to the Expert Group. The concerns were noted and it was agreed that this issue would be discussed further under Item 9 “Any other business”.

Item 3: Technical Advisory Group Update

Documentation:

- (i) Minutes of TAG meeting of 12 June
 - (ii) TAG Recommendation on CRIRSCO Template *circulated on 13 August*
 - (iii) TAG Recommendation on Uranium Bridging Document *circulated on 15 August*
4. The Chair provided an update on the work of the Technical Advisory Group (TAG). The Chair observed that a core group of TAG members are extremely active and others less so. The TAG last met on 8 August and subsequently submitted its recommendations on both the CRIRSCO Template and the Uranium Bridging Document to the Chair of the Bureau. The

TAG is also continuing its review of the solid minerals case study presented to the EGRC at its fifth session.

5. Members agreed to discuss the TAG Recommendation on the Uranium Bridging Document under Item 4.

TAG Recommendation on the CRIRSCO Template

6. The Chair summarized the TAG recommendation on the CRIRSCO Template: the TAG is of the view that the updates to the CRIRSCO Template of November 2013 improve the consistency of reporting using the Template as the primary commodity-specific specifications and guidelines for solid minerals under UNFC-2009. Importantly the changes do not invalidate the Bridging Document between the Template and UNFC-2009 nor lead to any misalignment, on the contrary, they enhance the mapping. The TAG recommends that the Bridging Document between the CRIRSCO Template be updated when practical to reference the 2013 version of the CRIRSCO Template rather than the 2006 version and that the mapping be extended to include Exploration Target.

7. The Chair then drew attention to the proposal circulated to the Bureau on 18 August by Jim Ross to ensure that due process is followed with regard to updating Bridging Documents.

8. The TAG has noted that the Bridging Document will need to be updated, in order to reference the revised version of the CRIRSCO Template and also to extend the mapping therein to address Exploration Target. Bridging Documents are subject to endorsement by the EGRC and hence the EGRC will also need to view the revised Bridging Document as part of the approval process. The proposal was therefore made to ask the TAG to prepare a revised version of the Bridging Document (using track changes) that can be submitted to the EGRC (once approved by the Bureau) together with the Bureau recommendation for adoption of the 2013 version of the Template as the new basis for the specifications for solid minerals. Finally, since the revised Bridging Document will replace the existing version that is included in Energy Series 42 (UNFC-2009 *incorporating* Specifications for its Application), there needs to be a practical process for handling changes to the UNFC's commodity-specific specifications (and hence to the relevant Bridging Document), once these have been accepted by the EGRC, both now and in the future. This might be best handled by maintaining a current version electronically on the UNECE website rather than reprinting the document too frequently. Whatever process is adopted, there needs to be clarity at all times regarding the exact source of the EGRC-endorsed commodity-specific specifications pertaining to UNFC.

9. The Bureau agreed with the proposal from Jim Ross i.e. that the EGRC needs to agree to reference the CRIRSCO Template of 2013 in UNFC-2009 *incorporating* Specifications for its Application (as opposed to the Template of 2006) and any changes to the Bridging Document at the same time. The Bureau discussed the possibility of the EGRC approving the revised Bridging Document by written procedure and noted in principle that this should be possible as the issue relates to a technical matter and not a procedural one – the provisions for this having been agreed at the EGRC fifth session. However, it was observed that the deadline for preparation of documentation for the EGRC sixth session is early February 2015 hence it was agreed to not deal with this issue by written procedure but to prepare a revised Bridging Document for consideration by the EGRC at its sixth session.

10. The Bureau agreed to adopt the TAG recommendation to update the Bridging Document.
11. A number of Bureau members, including the Chair, Jim Ross and the CRIRSCO representatives, offered to prepare a revised version of the Bridging Document for consideration by the TAG prior to submission to the Bureau.
12. The Bureau agreed on the importance of due process being followed regarding Bridging Documents. If changes are made to UNFC-2009 either directly or indirectly these need to be approved by the EGRC. Discussion focussed on the process to be followed if the changes are only very minor ones/non material and it was agreed that this should be raised at the EGRC sixth session so that the appropriate procedure can be agreed.
13. The Chair and the other members of the TAG were thanked by the Bureau for their continued efforts.

**Item 4: Update on Application of UNFC-2009 to Nuclear Fuel Resources
Decision on submission of Uranium Bridging Document to Committee on Sustainable Energy for endorsement**

Documentation: Uranium Bridging Document for Submission to the Committee on Sustainable Energy (both track changes and clean versions)

14. The Chair of the Task Force on Application of UNFC-2009 to Nuclear Fuel Resources provided an update on the changes made to the Bridging Document between the OECD NEA/IAEA Uranium Classification and UNFC-2009 (Uranium Bridging Document) compared to the version circulated at the EGRC fifth session. One of the main changes is to figure two in relation to the G axis. He noted that the Glossary will now be included in the Guidebook on Application of UNFC-2009 to Uranium and Thorium Projects that is under preparation as opposed to the Bridging Document. In order to assist the TAG in its review of the Bridging Document a three-way mapping between UNFC-2009, the NEA/IAEA Uranium Classification (“Red Book”) and the CRIRSCO Template was made, which will be included in the Guidebook.
15. The Guidebook being prepared will incorporate a large portion of the Bridging Document as well as a number of case studies, including from Argentina, Brazil, India, Malawi and the United States. The case studies are being coordinated by the representative from the US Geological Survey.
16. The TAG Recommendation on the Uranium Bridging Document was circulated on 15 August. The Chair of the Bureau summarized the recommendation noting that the TAG is of the view that the Uranium Bridging Document meets all needed requirements and recommends its adoption by the EGRC. The TAG did not voice any objections to the Glossary being included in the Guidebook on Application of UNFC-2009 to Uranium and Thorium Projects as opposed to the Bridging Document which had been foreseen at the EGRC fifth session.
17. The Chair of the Bureau advised that there is an ongoing area of non-consensus in the TAG relating to the need or not to also map a new document to the underlying systems of UNFC-2009 for solid minerals and petroleum i.e. the CRIRSCO Template and PRMS

respectively. Some members of the TAG are of the view that this is not needed and others believe the three-way mapping is a requirement.

18. Bureau members discussed the TAG recommendation and agreed to adopt it. The Bureau agreed that the changes made to the Uranium Bridging Document do not constitute a “significant change” (as per paragraph 49 of the meeting report of the EGRC fifth session). The Bureau approved the final version of the Uranium Bridging Document and agreed that it should be submitted to the Committee on Sustainable Energy at its twenty-third session in November 2014 for endorsement

19. The Chair and other members of the Task Force were thanked by the Bureau for their continued efforts.

20. The Chair underlined that the agreement on the final version of the Uranium Bridging Document is a significant moment in the extension and development of UNFC-2009.

Item 5: Update on Application of UNFC-2009 to Renewable Energy Resources
Documentation: Minutes of Task Force meeting of 6 June 2014 circulated on 18 July

21. The representative of the Task Force on Application of UNFC-2009 to Renewable Energy Resources provided an update on the work of the Task Force. The Task Force members who will lead the work on development of commodity-specific specifications to geothermal, bioenergy and solar/wind/hydro have been identified. A common framework for development of the commodity-specific specifications has been developed and agreed upon.

22. Following the success of the workshop on application of UNFC-2009 to renewables in Washington earlier this year, a second workshop will be held in Geneva, 17pm-18am November 2014. This event will be back to back with the first meeting of the new UNECE Group of Experts on Renewable Energy, 18pm-19am November.

23. The draft generic renewables specifications are available for public comment until 12 September. Only one comment has been received to date.

24. The text of the Memorandum of Understanding between UNECE and the International Geothermal Association (IGA) has now been finalized and agreed upon by both parties. The MoU will be sent shortly to IGA for signature.

25. To help support development of a global standard for geothermal resources, IGA will receive USD 100,000 of funding from ESMAP. This activity is fully in line with EGRC’s work with no conflicts identified.

26. The next call of the Task Force will be held on 21 August. The Chair of the Task Force is keeping the TAG focal point, Alistair Jones, informed of progress.

27. The Bureau thanked the Chair and other members of Task Force for their continued efforts.

28. The representative of the Oil and Natural Gas Corporation Limited (ONGC) of India provided an update on the ongoing activities related to the application of UNFC-2009 in India. A core committee has been formed to look into the feasibility of moving from the

current system of resource classification to UNFC-2009. The committee has representatives from the oil and gas, coal and renewable energy sectors. A number of projects have been selected to classify reserves as per the UNFC-2009 specifications, including with Coal India for coal and a renewable energy project. There is interest in an expert from India joining the Renewables Task Force.

Item 6: Update on Application of UNFC-2009 to Injection Projects

29. The Chair of the Task Force on Application of UNFC-2009 to Recipient Reservoirs provided an update on the work of the Task Force. Work has started on the Specifications document, which will follow the same format/layout used for the generic renewables specifications.

30. The new Task Force member from the British Geological Survey has reviewed all the material prepared to date by the Task Force i.e. the tables with Definitions and Supporting Explanations and her proposed amendments are being incorporated. Work has also started on the Glossary of Terms.

31. The Task Force is planning to hold a conference call at the end of August. During this call the Task Force will discuss and agree on the timeline for preparation of the specifications document in order to be able to deliver a draft to the EGRC sixth session that has been reviewed by the TAG and Bureau.

32. The TAG focal point for the Task Force, Per Blystad, is copied on all Task Force correspondence.

33. The Chair and members of the Task Force were thanked for their continued efforts to progress this work.

Item 7: Guidance on environmental and social considerations

Documentation: Draft ToR for Economic & Social Issues Sub-group and Discussion Note

34. The Chair thanked David Elliott for preparing the draft Terms of Reference and the discussion note as circulated on 13 August. Mr. Elliott was also thanked for agreeing to Chair Phase One of the Task Force, as per the discussions during the last Bureau call.

35. The proposal is that Phase One will determine the objective of the sub-group and develop the draft instructions from the Bureau to the sub-group. Approval by the Bureau of the recommendations of Phase One will be needed prior to proceeding to Phase Two of the work. Phase Two will essentially focus on implementation and development of guidance for presentation to the EGRC sixth session. Mr. Naresh Kumar, Joint Secretary of the Ministry of Mines of India, has been invited to Chair Phase Two.

36. During discussion, members noted that environmental and social considerations are a sensitive issue and it will be important to ensure that any work undertaken is inclusive and seeks the input of all relevant stakeholders. The representative of the European Commission expressed the interest of the EC being involved in both phases of the work and emphasized the need for outputs to be high-level, generic, measurable and not duplicative of any existing material.

37. In order to ensure that there are no inconsistencies in the development of the specifications for renewables and CO2 storage, the importance of keeping the Chairs of the Task Forces on Recipient Reservoirs and Injection Projects informed as this work progresses was underlined.

38. It was agreed that the proposed list of experts to be invited to join the Phase One Task Force should be circulated to the Bureau for information.

39. The representative of the Nigerian Geological Survey Agency recommended that Julian Hilton be invited to be part of Phase Two.

40. Members agreed to the approach outlined in the Terms of Reference circulated on 13 August and that Phase One of the work can start under David Elliott's Chairmanship.

Item 8: Education and outreach

Documentation:

- (i) List of Conferences Promoting UNFC in 2014 and 2015 (as at 12 August 2014)
- (ii) Minutes of 30 April Communications Sub-Committee Meeting *circulated on 18 July*

41. A brief update was provided on education and outreach activities. The next meeting of the Communications Sub-Committee will be in September.

42. The Chair drew attention to the Workshop on Classification of Polymetallic Nodules Resources from the Deep Seabed that is being organized by the International Seabed Authority and the Indian Ministry of Earth Sciences in Goa, India, 13–17 October 2014. This is the first time the Expert Group will be looking at deep sea minerals. The Chair and the secretariat will both attend, as will a representative of CRIRSCO.

43. The representative of CCOP advised that the UNFC Workshop for Minerals and Oil & Gas due to be jointly organized by CCOP, Department of Mineral Resources (DMR) and Department of Mineral Fuels of Thailand in November 2014 will now be postponed with a timing of March 2015 under consideration. The event will still be held in Bangkok as opposed to Beijing which had been under consideration as the potential venue.

44. The representative of the European Commission drew attention to the MIN WIN-WIN conference that will be held in Brussels, 21–23 November, on “Establishing Europe-Wide Minerals Reporting Standards – The Key to Reducing Risk and Increasing Opportunity”. A presentation on UNFC will be delivered by Sigurd Heiberg.

45. The representative of ONGC informed the Bureau about the Workshop on UNFC-2009 that will take place as part of the Geo-India 2015 Conference (3rd South Asian Geosciences Conference and Exhibition) in New Delhi, 11-14 January 2015. The EGRC Chair will deliver all the presentations during the workshop.

46. The representative of IAEA advised that administrative arrangements will start shortly for the IAEA-UNECE Regional Workshop on “Application of UNFC-2009 for Uranium Projects” to be held in Johannesburg, 10-14 November.

47. The Chair advised that he will deliver a presentation on UNFC to a delegation from the National Hydrocarbons Commission of Mexico in London on 26 August 2014.

48. Bureau members were requested to keep the secretariat informed of all upcoming events of relevance to the work of the EGRC and UNFC.

Item 9: Any other business

(i) Bridging Document between new Russian Federation classification for petroleum and UNFC-2009

49. The Chair noted that the Secretariat was contacted by GKZ in July 2014 to advise that GKZ intends to carry out a “mapping” between UNFC-2009 and the new Classification System on Mineral Resources of Russian Federation. At the same time, the National Association for Subsoil Examination (NP NAEN) has announced a joint project with Ryder Scott (a US-based petroleum consulting firm), to establish a new petroleum classification. The Chair has been invited to the present on UNFC at the conference that will be organized in relation to this work. The TAG is aware of these developments and the TAG Chair will contact GKZ to seek clarification.

50. The Chair noted that the new Russian Federation Classification under consideration is much the same as the former system but with changes to the definitions to include more project-oriented concepts such as those included in UNFC-2009 and PRMS.

(ii) COGEH Resources Other than Reserves (ROTR) Guidelines

51. David Elliott advised that the ROTR Guidelines have now been published and can be purchased from the SPE Canada website, with a link also available on the SPEE Canada website.

(iii) Definition of Consensus

52. In view of time constraints, it was agreed that the discussion on the definition of consensus as it would apply to the Bureau should be put on the agenda of the next Bureau meeting. The Chair and the secretariat will review the definition as contained in the minutes of the Bureau calls of 24-25 June and prepare a revised version for consideration by the Bureau at its next meeting.

Item 10: Timing of next meeting

53. The next Bureau call will be held during the first half of October. An availability message will be circulated as per usual practice.
