PROPOSAL FOR A CGMS WORKING GROUP ON CODES

(Submitted by WMO)

Summary and Purpose of Document

The paper contains a proposal that was initially submitted to CGMS Secretariat on 18 May 2006 with the expectation that a Working Group on Codes could be swiftly established, in response to CGMS Action 32.17 from CGMS-XXXII and Action 33.20 from CGMS-XXXIII.

CGMS is regularly faced with the need to develop updates to BUFR tables in order to accommodate new data types originating from new satellites and instruments. It was agreed under CGMS Action 32.17 to establish a working group to deal with this issue. Although it was reinforced at CGMS 33 by the discussion under item II/7, this was not implemented so far.

The present draft Terms of Reference are submitted to CGMS-XXXIV for discussion, with the expectation that a new CGMS Working Group would be established without delay.

Appendix: Draft Terms of Reference for a Working Group on Codes.
DISCUSSION

1. CGMS Members are regularly faced with the need to develop update to BUFR tables in order to accommodate new data types from new instruments and satellite series.

2. At CGMS-XXXII it was recognized that an efficient approach of this issue would be to establish a working group and it was agreed under Action 32.17 that “A working group of CGMS Members should be established to draft a master BUFR table for satellite data. CGMS should designate a Rapporteur between this group and the CBS Expert Team on Data Representation and Codes. CGMS designated experts will be asked for input and maintain the master BUFR table for satellite data”.

3. The issue was discussed again at CGMS-XXXIII under agenda item II/7 on Coordination of code forms for satellite data, and two different issues were addressed:

   a) EUM-WP-15 and WMO-WP-10 raised the issue of representation of satellite data in BUFR code and highlighted the need for a dedicated task force to work out proposals in this area. WMO reminded that CGMS 32 had agreed the following action:

      “A working group of CGMS members should be established to draft a master BUFR table for satellite data. CGMS should designate a Rapporteur between this group and the CBS ET on Data Representation and Codes. CGMS Member designated experts will be asked for input and to submit updates at upcoming CGMS meetings. The WMO Space Programme will compile the input and maintain the master BUFR table for satellite data”;

   b) NOAA-WP-24 addressed Direct Broadcast matters and suggested establishing an International Direct Broadcast Working Group as a forum to exchange vital technical planning information regarding achieving access to and maintaining consistency of level 0 and level 1 data.

4. It was suggested that a Working Group on Direct Broadcast could possibly be tasked to draft a master BUFR table for satellite data, and CGMS finally agreed that a Task Force would draft Terms of Reference of such a new Working Group.

5. From a WMO viewpoint, Direct Broadcast and BUFR codes are two important issues that deserve consideration, however it is not clear that the same group should address both of them. As a matter of fact the Task Force has not yet been established and thus no progress was recorded in the direction of a joint working group.

6. The input proposed below by WMO focuses only on the Codes aspects (BUFR tables and GTS related issues). It is proposed to establish the Working Group on Codes on this basis as a first step.

7. CGMS may wish to also establish a Task Force, as agreed by Action 33.20, to draft Terms of Reference for a Direct Broadcast Working Group. The Task Force would consider the pros and cons of addressing Codes and Direct Broadcast through the same working group and modalities or independently, and report to CGMS plenary. If the Terms of Reference and Membership appear to be compatible, the same working group would ultimately handle Direct Broadcast and Codes issues, but this process would not delay the establishment of the WG on Codes.
Draft Terms of Reference for a Working Group on Codes and related matters

The CGMS Working Group on Codes will have the following tasks:

1. To review the issues related with satellite data representation, identification and handling within the IGDDS, and express guidance to CGMS satellite operators with a view to facilitate the use of satellite data and products worldwide within the operational context. The WG shall anticipate the changes that may be necessary as a result of the increasing number of satellites, improved spectral and geometrical resolution of instruments, new instrument concepts and operating modes and of the evolving use of satellite data. The WG shall express guidance for implementing the recommendations from relevant WMO bodies as concerns the evolution of code forms, bulletins headings and other data identifiers in the overall framework of the WMO Information System;

2. To review specifically the plans for new satellite data and products before they are made available to operational centres, in particular in the case of new instrument types generating new geophysical variables, and to propose suitable representation of these data and products in WMO agreed code forms (e.g. GRIB edition 2, BUFR, etc.) In particular, the WG would propose additions to WMO BUFR Master Table or to a Satellite BUFR Master Table, as appropriate. Such proposals shall be forwarded for review and endorsement by the WMO/CBS Expert Team on Data Representation and Codes (ET-DRC) for ensuring their conformity with the WMO Codes regulations, and further approval by CBS.

3. To review the issues related with the circulation of satellite data and products over the GTS and other components of the WMO Information System, and provide guidance to CGMS satellite operators to define suitable headings or data identifiers for new bulletins and data files as appropriate. In particular, the WG would review existing tables of satellite data designators, or propose new tables, to be included in future amendments of Attachment II-5 of the Manual on the GTS. Such proposals shall be forwarded to the WMO/CBS Expert-Teams on WIS Operation and Implementation (ET-OI).

4. To interact as appropriate with ET-DRC and ET-OI with cross-representation at relevant meetings;

5. To report to CGMS plenary;

6. The working group will nominate a Rapporteur and a Chairman. It will meet at least once a year, and more if necessary, and will pursue its work by correspondence between its meetings.

NOTES

(a) With respect to item (3) above it should be noted that WMO is considering to allocate the specific data designators “\( T_1 T_2 = I N \)” for future satellite data bulletins in BUFR over the GTS, hence the need to define a new Cx table providing data designators for all space-based observation data. This change would be effective by November 2007. This should be among the first issues for consideration by the WG. The WG would be expected to support the ET-OI in developing a typology of satellite data and products to be used as a basis for the new Cx table;

(b) The present draft TOR were reviewed and by the Expert Team on WIS Operation and Implementation (ET-OI) during its meeting in Geneva, 16-19 May, for items of their competence, i.e. items (3) and (4) and Note (a).