

PUS-based software requirement benchmarking - Scheduling Service

OOSSS = Onboard Operations Scheduling Service Specification

Aplicability of some features of the service	App.
Concept of sub-schedule	1
Concept of interlocking	1
Selection of telecommands in the schedule at application process level	1
Insertion of more than one telecommand per time	1
Concept of "scatter delete"	1
Concept of "scatter time-shift"	1
Selective time-shifting of telecommands in a time range	1
Concept of "scatter report"	1
Concept of relative time	1
Selective reporting of telecommands in a time range	1

Start time	Finish time
0:00	0:00
0:00	0:00
0:00	0:00
0:00	0:00
0:00	0:00

Questions	App.	Ans	Observations
1. Does the OOSSS define the On-board Operations Scheduling Service type as 11?	1	0	
2. Does the OOSSS state that this service shall maintain a command schedule which contains telecommand packets and their associated scheduling information?	1	0	
3. Does the OOSSS state that this service shall be capable of enabling the scheduling of all, or a subset of, the telecommands in the command schedule through the request of some service user?	1	0	
4. Does the OOSSS state that this service shall be capable of disabling the scheduling of all, or a subset of, the telecommands in the command schedule through the request of some service user?	1	0	
5. Does the OOSSS state that this service shall be capable of adding telecommands to the command schedule through the request of some service user?	1	0	
6. Does the OOSSS state that this service shall be capable of deleting all, or a subset of, the telecommands in the command schedule through the request of some service user?	1	0	
7. Does the OOSSS state that this service shall be capable of time shifting all, or a subset of, the telecommands in the command schedule through the request of some service user?	1	0	
8. Does the OOSSS state that this service shall be capable of reporting on all, or a subset of, the telecommands in the command schedule through the request of some service user?	1	0	
9. Does the OOSSS state that this service shall be capable of reporting the status of the command schedule through the request of some service user?	1	0	
10. Does the OOSSS state that this service shall refuse to perform a request in its entirety if this creates an inconsistency in the command schedule?	1	0	
11. Does the OOSSS define the sub-schedule with which a telecommand is associated as a scheduling attribute of telecommands?	1	0	

12. Does the OOSSS define the number of the interlock to be set by a telecommand (if any) as a scheduling attribute of telecommands?	1	0	
13. Does the OOSSS define the number of the interlock on which the release of a telecommand is dependent as a scheduling attribute of telecommands?	1	0	
14. Does the OOSSS define whether the release of a telecommand is dependent on the success or on the failure of the telecommand with which it is interlocked as a scheduling attribute of telecommands?	1	0	
15. If relative time is supported in the OOSSS, does the OOSSS define whether the release of a telecommand packet to its destination application process is related to the absolute on-board time or to a relative time as a scheduling attribute of telecommands?	1	0	
16. If relative time is supported in the OOSSS, for each use of relative time, does the OOSSS define the scheduling event to which the relative time is respected to? (This can be the starting of the command schedule, the starting of the sub-schedule containing the telecommand, the setting of the interlock with which the telecommand is interlocked, or the occurrence of a mission-specific event)	1	0	
17. Does the OOSSS state that the release status of a telecommand shall be "enabled" only if the release of telecommands is enabled from the command schedule, from the sub-schedule to which the telecommand belongs (if applicable), and to the destination application process of the telecommand?	1	0	
18. Does the OOSSS state the the release status of a telecommand shall be "disabled" in all the cases different from the case described in question 17 of this checklist?	1	0	
19. Does the OOSSS state that if the release status of a telecommand is "disabled" or its interlock status is "locked", the telecommand shall not be released when its interlock is due for release?	1	0	
20. Does the OOSSS state that when a telecommand is not released when its interlock is due for release, this service shall set the result of the telecommand execution to "failure"?	1	0	
21. Does the OOSSS state that if a released telecommand sets an interlock, this service shall explicitly indicate this fact to the destination application process?	1	0	
22. Does the OOSSS state that when this service releases a telecommand that sets an interlock, this service shall be able to receive a report from the destination application process with the telecommand execution result?	1	0	
23. Does the OOSSS state that this service shall set the telecommand execution result accordingly to the report received from the destination application process ("success" or "failure")?	1	0	
24. Does the OOSSS state that if this service does not receive the execution completion report from the destination application process after the maximum execution duration of the telecommand has elapsed, this service shall set the telecommand execution result to "failure"?	1	0	
25. Questions about the interlock status of a telecommand that is due for release and its release depends on an interlock:			
25.1 Does the OOSSS state that if the release of the telecommand depends on the success of the telecommand setting the interlock and the telecommand execution result attached to the interlock is "failure", then the interlock status shall be "locked"?	1	0	

25.2 Does the OOSSS state that if the release of the telecommand depends on the failure of the telecommand setting the interlock and the telecommand execution result attached to the interlock is "success", then the interlock status shall be "locked"?	1	0	
26. If relative time is supported in the OOS, does the OOSSS state that this service shall store the on-board CUC time at which the command schedule was enabled?	1	0	
27. If relative time is supported in the OOS, does the OOSSS state that this service shall store the on-board CUC time at which a sub-schedule was enabled, for each sub-schedule which contains telecommands whose release time is relative to the sub-schedule enable time?	1	0	
28. If relative time is supported in the OOS, does the OOSSS state that this service shall store the on-board CUC time of reception of the telecommand completion report (or of occurrence of the execution completion timeout), for each interlocking telecommand whose execution completion is a scheduling event for subsequent telecommands?	1	0	
29. Does the OOSSS state that this service shall refuse to add or time-shift telecommands if this results in an interlock-dependent telecommand appearing before the execution completion timeout defined for its interlocking telecommand?	1	0	
30. Does the OOSSS define the maximum number of entries or maximum size of the command schedule?	1	0	
31. Does the OOSSS define the maximum number of sub-schedules which can be simultaneously managed?	1	0	
32. Does the OOSSS define the maximum number of interlocks which can be simultaneously managed?	1	0	
33. Does the OOSSS define the list of sources from which this service can receive telecommand packets to be scheduled?	1	0	
34. Does the OOSSS define the list of on-board application processes to which this service can release telecommand packets?	1	0	
35. Does the OOSSS state that the processing of a telecommand packet whose release time is due shall always be performed?	1	0	
36. Does the OOSSS state that the telecommand shall not be released if the telecommand release status is "disabled" or the telecommand interlock status is "locked"?	1	0	
37. Does the OOSSS state that the telecommand shall be released in the situations different from the situation described in question 36?	1	0	
38. Does the OOSSS state that this service shall detect and report any on-board CUC time jumps?	1	0	
39. Does the OOSSS state that this service shall suspend its execution as soon as it has processed all the telecommands which are interlocked with telecommands which have already been released on detection of a time jump?	1	0	
40. Questions about the service requests to enable or disable the release of (selected) telecommands.			
40.1 Does the OOSSS state that the service requests to enable the release of (selected) telecommands shall have subtype 1?	1	0	
40.2 Does the OOSSS state that the service requests to disable the release of (selected) telecommands shall have subtype 2?	1	0	

40.3 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the first field of the application data shall be the parameter N1, that indicates the number of sub-schedules to be enabled or disabled?	1	0	
40.4 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the first field of the application data shall be an unsigned integer number?	1	0	
40.5 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the second field of the application data shall be the Sub-Schedule ID, that identifies the sub-schedule to be enabled or disabled?	1	0	
40.6 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the second field of the application data shall be of the type enumerated?	1	0	
40.7 If the OOSS supports selection at application process level, does the OOSSS state that the third field of the application data shall be the parameter N2, that indicates the number of APIDs to be enabled or disabled?	1	0	
40.8 If the OOSS supports selection at application process level, does the OOSSS state that the third field of the application data shall be an unsigned integer number?	1	0	
40.9 If the OOSS supports selection at application process level, does the OOSSS state that the fourth field of the application data shall be the APID, that identifies the APID to be enabled or disabled?	1	0	
40.10 If the OOSS supports selection at application process level, does the OOSSS state that the fourth field of the application data shall be of the type enumerated?	1	0	
40.11 If the OOSS supports the concept of sub-schedules, does the OOSSS state that if this service receives a request with $N1 = 0$, this service shall enable or disable (it depends on the request, i.e. the subtype of the telecommand) all the telecommands in the schedule?	1	0	
40.12 If the OOSS supports the concept of sub-schedules and selection at application process level, does the OOSSS state that if this service receives a request with $N1 > 0$ and $N2 = 0$, this service shall enable or disable (it depends on the request, i.e. the subtype of the telecommand) the telecommands of the specified sub-schedule, without taking into account the APID of them?	1	0	
41. Questions about the resetting of the command schedule			
41.1 Does the OOSSS state the service request to reset the command schedule shall have subtype 3?	1	0	
41.2 Does the OOSSS state that the request to reset the command schedule shall not have application data?	1	0	
41.3 Does the OOSSS state that when this service receives the request to reset the command schedule, this service shall perform this as described in the following three lines? (if interlocking is not applicable, ignore the second line)	1	0	
41.3.1 It shall clear all entries in the command schedule			
41.3.2 It shall reset the interlock information			
41.3.3 It shall reset the scheduling event information			
42. Questions about the insertion of telecommands in the command schedule			
42.1 Does the OOSSS state that the service request to insert one or more telecommands in the command schedule shall have subtype 4?	1	0	

42.2 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the first field of the application data shall be the sub-schedule ID, that identifies the sub-schedule with which the following telecommand(s) is (are) associated?	1	0	
42.3 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the first field of the application data shall be of the type enumerated?	1	0	
42.4 If the OOSS supports the insertion of more than one telecommand per time, does the OOSSS state that the second field of the application data shall be the parameter N, that indicates the number of telecommands to be inserted in the schedule?	1	0	
42.5 If the OOSS supports the insertion of more than one telecommand per time, does the OOSSS state that the second field of the application data shall an unsigned integer number?	1	0	
42.6 If the OOSS supports the concept of interlocking, does the OOSSS state that the third field of the application data shall be the interlock set ID, that identifies the interlock to be set by the telecommand being inserted?	1	0	
42.7 If the OOSS supports the concept of interlocking, does the OOSSS state that the third field of the application data shall be of the type enumerated?	1	0	
42.8 If the OOSS supports the concept of interlocking, does the OOSSS state that the interlock set ID field of the application data shall have value 0 if no interlock is set?	1	0	
42.9 If the OOSS supports the concept of interlocking, does the OOSSS state that the fourth field of the application data shall be the interlock assessed ID, that identifies the interlock on which the release of the telecommand being inserted is dependent?	1	0	
42.10 If the OOSS supports the concept of interlocking, does the OOSSS state that the fourth field of the application data shall be of the type enumerated?	1	0	
42.11 If the OOSS supports the concept of interlocking, does the OOSSS state that the interlock assessed ID field of the application data shall have value 0 if no interlock is assessed?	1	0	
42.12 If the OOSS supports the concept of interlocking and if the telecommand being inserted is interlock dependent, does the OOSSS state that the fifth field of the application data shall be the Assessment Type, that indicates whether the telecommand being inserted is dependent on the success or failure of the telecommand with which it is interlocked?	1	0	
42.13 If the OOSS supports the concept of interlocking and if the telecommand being inserted is interlock dependent, does the OOSSS state that the fifth field of the application data shall be of the type enumerated?	1	0	
42.14 If the OOSS supports the concept of interlocking and if the telecommand being inserted is interlock dependent, does the OOSSS state that the fifth field of the application data shall have one of the values listed in the following two lines?	1	0	
42.14.1 "Sucess", value = 1			
42.14.2 "Failure", value = 0			

42.15 If the OOSS supports the concept of relative time, does the OOSSS state that the sixth field of the application data shall be the Scheduling Event, that indicates whether the release time of the telecommand being inserted is an absolute on-board CUC time or a relative time?	1	0	
42.16 If the OOSS supports the concept of relative time, does the OOSSS state that the sixth field of the application data shall be of the type enumerated?	1	0	
42.17 If the OOSS supports the concept of relative time, does the OOSSS state that the sixth field of the application data shall have one of the values listed in the following four lines? (except for the mission-specific values)	1	0	
42.17.1 "Absolute", value = 0			
42.17.2 "Schedule", value = 1			
42.17.3 "Sub-Schedule", value = 2			
42.17.4 "Interlock", value = 3			
42.18 Does the OOSSS state that the seventh field of the application data shall be the Abs/Rel Time Tag, that indicates the time tag of the telecommand being inserted?	1	0	
42.19 Does the OOSSS state that if the Scheduling Event field has the value "Absolute", then the Abs/Rel Time Tag field shall have the on-board CUC time at which the telecommand packet being inserted in the command schedule shall be sent to its destination application process?	1	0	
42.19 Does the OOSSS state that if the Scheduling Event field indicates a relative time, then the Abs/Rel Time Tag field shall have an on-board positive delta time which, when added to the time of occurrence of the event identified by the Scheduling Event, shall determine the absolute time at which the telecommand packet shall be sent to its destination application process?	1	0	
42.20 If the OOSS supports the concept of interlocking, does the OOSSS state that the eighth field of the application data shall be the Execution Timeout, that indicates an on-board positive delta time which, when added to the time of release of the telecommand, determines the latest time at which the execution of the telecommand is expected to complete ?	1	0	
42.21 If the OOSS supports the concept of interlocking, does the OOSSS state that if an execution completion report is not received by this service within the timeout window, then the telecommand shall be deemed to have failed?	1	0	
42.22 Is the format and length of the Execution Timeout field the same as for the absolute time tag defined for the on-board application process which provides the service?	1	0	
42.23 Does the OOSSS state that the telecommand packet to be inserted in the command schedule shall be after the eighth field of the application data? (If all the fields of the application data are present. If not, so the place where the telecommand packet shall be depends on the quantity of fields that there is in the application data)	1	0	
42.24 Does the OOSSS state that if a telecommand to be added has a relative time with respect to an intelock, it shall be "linked" to the latest telecommand added to the command schedule which sets that interlock?	1	0	

42.25 In the situation described in question 42.24, does the OOSSS describe the situations in which an error shall occur as the following ones?	1	0	
42.25.1 the command schedule is full			
42.25.2 the Sub-schedule ID or one of the Interlock IDs exceeds its maximum value			
42.25.3 the Interlock IDs are equal			
42.25.4 the destination application process of the telecommand is invalid			
42.25.5 the time specification refers to the past			
42.25.6 the time specification is not supported by the service			
42.25.7 the telecommand is interlock dependent and its release time falls within the execution window of its interlocking telecommand			
42.25.8 the telecommand has an "Interlock" relative time and no telecommand added since the last resetting of the command schedule sets the interlock			
43. Questions about the deletion of telecommands in the command schedule			
43.1 Does the OOSSS state that this service shall refuse to delete an interlocking telecommand unless all its interlocked telecommands have either already been deleted or are deleted in the same deletion request?	1	0	
43.2 Does the OOSSS state that if an error is detected during the processing of a request, nothing shall be deleted?	1	0	
43.3 Does the OOSSS state that the service request to delete one or more telecommands in the command schedule shall have subtype 5?	1	0	
43.4 If the OOSSS supports the concept of "scatter delete", does the OOSSS state that the first field of the application data shall be the N, that indicates the quantity of sets of telecommand packets shall be deleted with an unique request?	1	0	
43.5 If the OOSSS supports the concept of "scatter delete", does the OOSSS state that the first field of the application data shall be of the type unsigned integer?	1	0	
43.6 Does the OOSSS state that the second field of the application data shall be the Application Process ID, that indicates (together with the Sequence Count) the telecommand packet to be deleted?	1	0	
43.7 Does the OOSSS state that the second field of the application data shall be of the type enumerated?	1	0	
43.8 Does the OOSSS state that the third field of the application data shall be the Sequence Count, that indicates (together with the APID) the telecommand packet to be deleted?	1	0	
43.9 Does the OOSSS state that the third field of the application data shall be of the type unsigned integer?	1	0	
43.10 Does the OOSSS state that the fourth field of the application data shall be the Number of Telecommands, that indicates the number of successive telecommand packets sent by the source to the specified destination application process which shall be deleted?	1	0	
43.11 Does the OOSSS state that the fourth field of the application data shall be of the type unsigned integer?	1	0	
43.12 Does the OOSSS state that an error shall occur if the first telecommand to be deleted is not found in the command schedule?	1	0	

43.13 Does the OOSSS state that if the Number of Telecommands exceeds the total number of commands that satisfy the selection criteria, then all commands that satisfy the selection criteria shall be deleted?	1	0	
44. Question about the deletion of telecommands in the command schedule over a time period			
44.1 Does the OOSSS state that the service request to delete one or more telecommands in the command schedule over a time period shall have subtype 6?	1	0	
44.2 Does the OOSSS state that the first field of the application data shall be the Range, that indicates the time period as the following four possible values?	1	0	
44.2.1 from the beginning to the end of the command schedule if Range is "All" (value = 0)			
44.2.2 between Time Tag 1 and Time Tag 2 inclusive if Range is "Between" (value = 1)			
44.2.3 less then or equal to Time Tag 1 if Range is "Before" (value = 2)			
44.2.4 greater than or equal to Time Tag 1 if Range is "After" (value = 3)			
44.3 Does the OOSSS state that the first field of the application data shall be of the type enumerated?	1	0	
44.4 Does the OOSSS state that the second field of the application data shall be the Time Tag 1, that indicates the earliest absolute time if Range is "Between" or "After", or the latest absolute time if Range is "Before"?	1	0	
44.5 Does the OOSSS state the the second field of the application data shall be of the type absolute time?	1	0	
44.6 Does the OOSSS state that the second field of the application data shall not be present if Range is "All"?	1	0	
44.7 Does the OOSSS state that the third field of the application data shall be the Time Tag 2, that indicates the latest absolute time if Range is "Between"?	1	0	
44.8 Does the OOSSS state the the third field of the application data shall be of the type absolute time?	1	0	
44.9 Does the OOSSS state the the third field of the application data shall not be present if Range is not "Between"?	1	0	
44.10 If the OOSS supports the concept of sub-schedule and the concept of selection at sub-schedule level, does the OOSSS state that the fourth field of the application data shall be N1, that indicates the number of sub-schedules to be deleted?	1	0	
44.11 If the OOSS supports the concept of sub-schedule and the concept of selection at sub-schedule level, does the OOSSS state that the fourth field of the application data shall be of the type unsigned integer?	1	0	
44.12 If the OOSS supports the concept of sub-schedule and the concept of selection at sub-schedule level, does the OOSSS state that the fifth field of the application data shall be the Sub-schedule ID, that identifies the sub-schedule from which telecommands shall be deleted?	1	0	
44.13 If the OOSS supports the concept of sub-schedule and the concept of selection at sub-schedule level, does the OOSSS state that the fifth field of the application data shall be of the type enumerated?	1	0	
44.14 If the OOSS supports the concept of sub-schedule and the concept of selection at sub-schedule level, does the OOSSS state that the value 0 for the Sub-schedule ID shall mean "all sub-schedules"?	1	0	

44.15 If the OOSS supports the concept of selection at application process level, does the OOSSS state that the sixth field of the application data shall be N2, that indicates the number of APIDs to be deleted?	1	0	
44.16 If the OOSS supports the concept of selection at application process level, does the OOSSS state that the sixth field of the application data shall be of the type unsigned integer?	1	0	
44.17 If the OOSS supports the concept of selection at application process level, does the OOSSS state that the seventh field of the application data shall be the Application Process ID, that identifies the destination application process from which telecommands shall be deleted?	1	0	
44.18 If the OOSS supports the concept of selection at application process level, does the OOSSS state that the seventh field of the application data shall be of the type enumerated?	1	0	
44.19 If the OOSS supports the concept of sub-schedule and the concept of selection at sub-schedule level, does the OOSSS state that if N1 = 0, all telecommands that have release times falling in the specified absolute time period shall be deleted?	1	0	
44.20 If the OOSS supports the concept of sub-schedule, the concept of selection at sub-schedule level, and the concept of selection at application process level, does the OOSSS state that if N1 > 0 and N2 = 0, all the telecommands which belong to the specified sub-schedule and have release times falling in the specified absolute time period shall be deleted?	1	0	
44.21 If the OOSS supports the concept of sub-schedule, the concept of selection at sub-schedule level, and the concept of selection at application process level, does the OOSSS state that if N1 > 0 and N2 > 0, all the telecommands which have the specified destination application processes, belong to the specified sub-schedule and have release times falling in the specified absolute time period shall be deleted?	1	0	
44.22 Does the OOSSS state that those telecommands whose absolute release times are not yet known shall not be deleted from the command schedule?	1	0	
45. Question about the time-shifting of telecommands in the command schedule			
45.1 Does the OOSSS state that this service shall refuse to time-shift a telecommand if its new absolute time would fall in the past or before the end of the execution window of its interlocking telecommand (if it is interlock dependent) or if its new relative time would become negative?	1	0	
45.2 Does the OOSSS state that if an error is detected during the processing of a request, nothing shall be time-shifted?	1	0	
45.3 Does the OOSSS state that the service request to time-shift all telecommands in the command schedule shall have subtype 15?	1	0	
45.4 Does the OOSSS state that the first and unique field of the application data to time-shift all telecommands shall be the Time Offset, that indicates a positive or negative interval of time that all telecommands shall be time-shifted?	1	0	
45.5 Does the OOSSS state that the Time Offset shall be of the type relative time?	1	0	

45.6 Does the OOSSS state that those telecommands whose absolute times are not yet known shall not be time-shifted when this request is received?	1	0	
46. Question about the time-shifting of selected telecommands in the command schedule			
46.1 Does the OOSSS state that the service request to time-shift a selected subset of telecommands in the command schedule shall have subtype 7?	1	0	
46.2 Does the OOSSS state that the first field of the application data shall be the Time Offset, that indicates a positive or negative interval of time that the selected telecommands shall be time-shifted?	1	0	
46.3 Does the OOSSS state that the first field of the application data shall be of the type relative time?	1	0	
46.4 If the OOSSS supports the concept of "scatter time-shift", does the OOSSS state that the second field of the application data shall be the N, that indicates the quantity of sets of telecommand packets shall be time-shifted with an unique request?	1	0	
46.5 If the OOSSS supports the concept of "scatter time-shift", does the OOSSS state that the second field of the application data shall be of the type unsigned integer?	1	0	
46.6 Does the OOSSS state that the third field of the application data shall be the Application Process ID, that indicates (together with the Sequence Count) the telecommand packet to be time-shifted?	1	0	
46.7 Does the OOSSS state that the third field of the application data shall be of the type enumerated?	1	0	
46.8 Does the OOSSS state that the fourth field of the application data shall be the Sequence Count, that indicates (together with the APID) the telecommand packet to be time-shifted?	1	0	
46.9 Does the OOSSS state that the fourth field of the application data shall be of the type unsigned integer?	1	0	
46.10 Does the OOSSS state that the fifth field of the application data shall be the Number of Telecommands, that indicates the number of successive telecommand packets sent by the source to the specified destination application process which shall be time-shifted?	1	0	
46.11 Does the OOSSS state that the fifth field of the application data shall be of the type unsigned integer?	1	0	
46.12 Does the OOSSS state that an error shall occur if the first telecommand to be time-shifted is not found in the command schedule?	1	0	
46.13 Does the OOSSS state that those telecommands whose absolute release times are not yet known shall not be time-shifted when this request is received?	1	0	
47. Question about the time-shifting of selected telecommands over a time period in the command schedule			
47.1 Does the OOSSS state that the service request to time-shift a selected subset of telecommands over a time period in the command schedule shall have subtype 8?	1	0	
47.2 Does the OOSSS state that the first field of the application data shall be the Range?	1	0	
47.3 Does the OOSSS state that the first field of the application data shall be of the type enumerated?	1	0	

47.4 Does the OOSSS state that the second field of the application data shall be the Time Tag 1, that indicates the earliest or the latest absolute time?	1	0	
47.5 Does the OOSSS state that the second field of the application data shall be of the type absolute time?	1	0	
47.6 Does the OOSSS state that the third field of the application data shall be the Time Tag 2, that indicates the latest absolute time?	1	0	
47.7 Does the OOSSS state that the third field of the application data shall be of the type absolute time?	1	0	
47.8 Does the OOSSS state that the fourth field of the application data shall be the Time Offset, that indicates a positive or negative interval of time that the telecommands shall be time-shifted?	1	0	
47.9 Does the OOSSS state that the fourth field of the application data shall be of the type relative time?	1	0	
47.10 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fifth field of the application data shall be N1, that indicates the number of sub-schedules to be time-shifted?	1	0	
47.11 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fifth field of the application data shall be of the type unsigned integer?	1	0	
47.12 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the sixth field of the application data shall be the Sub-schedule ID, that identifies the sub-schedule from which telecommands shall be time-shifted?	1	0	
47.13 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the sixth field of the application data shall be of the type enumerated?	1	0	
47.14 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the value 0 for the Sub-schedule ID shall mean "all sub-schedules"?	1	0	
47.15 If the OOSS supports the selective time-shifting of telecommands in a time range, does the OOSSS state that the seventh field of the application data shall be N2, that indicates the number of APIDs to be time-shifted?	1	0	
47.16 If the OOSS supports the selective time-shifting of telecommands in a time range, does the OOSSS state that the seventh field of the application data shall be of the type unsigned integer?	1	0	
47.17 If the OOSS supports the selective time-shifting of telecommands in a time range, does the OOSSS state that the eighth field of the application data shall be the Application Process ID, that identifies the destination application process from which telecommands shall be time-shifted?	1	0	
47.18 If the OOSS supports the selective time-shifting of telecommands in a time range, does the OOSSS state that the eighth field of the application data shall be of the type enumerated?	1	0	
47.19 If the OOSS supports the concept of sub-schedule and the selective time-shifting of telecommands in a time range, does the OOSSS state that if N1 = 0, all telecommands that have release times falling in the specified absolute time period shall have their release times time-shifted?	1	0	

47.20 If the OOSS supports the concept of sub-schedule and the selective time-shifting of telecommands in a time range, does the OOSSS state that if $N1 > 0$ and $N2 = 0$, all telecommands which belong to the specified sub-schedule and have release times falling in the specified absolute time period shall have their release times time-shifted?	1	0	
47.21 If the OOSS supports the concept of sub-schedule and the selective time-shifting of telecommands in a time range, does the OOSSS state that if $N1 > 0$ and $N2 > 0$, all telecommands which have the specified destination application processes, belong to the specified sub-schedule and have release times falling in the specified absolute time period shall have their release times time-shifted?	1	0	
47.22 Does the OOSSS state that those telecommands whose absolute release times are not yet known shall not be time-shifted when this request is received?	1	0	
48.General questions about the reporting of the command schedule contents			
48.1 Does the OOSSS state that the information of the telecommand in the command schedule shall be ordered according to the predicted times of telecommand release?	1	0	
48.2 Does the OOSSS state that only the telecommands for which the time of release has not yet expired shall be reported?	1	0	
49. Question about the reporting of the command schedule in detailed form			
49.1 Does the OOSSS state that the service request to a report of the command schedule content in detailed form shall have subtype 16?	1	0	
50. Questions about the reporting of a subset of the command schedule in detailed form			
50.1 Does the OOSSS state that the service request to a report of a subset of the command schedule content in detailed form shall have subtype 9?	1	0	
50.2 If the OOSS supports the concept of "scatter report", does the OOSSS state that the first field of the application data shall be the N, that indicates the quantity of sets of telecommand packets shall be reported?	1	0	
50.3 If the OOSS supports the concept of "scatter report", does the OOSSS state that the first field of the application data shall be of the type unsigned integer?	1	0	
50.4 Does the OOSSS state that the second field of the application data shall be the Application Process ID, that indicates (together with the Sequence Count) the set of telecommand packets to be reported?	1	0	
50.5 Does the OOSSS state that the second field of the application data shall be of the type enumerated?	1	0	
50.6 Does the OOSSS state that the third field of the application data shall be the Sequence Count, that indicates (together with the APID) the set of telecommand packets to be reported?	1	0	
50.7 Does the OOSSS state that the third field of the application data shall be of the type unsigned integer?	1	0	
50.8 Does the OOSSS state that the fourth field of the application data shall be the Number of Telecommands, that indicates the number of successive telecommand packets which shall be reported?	1	0	
50.9 Does the OOSSS state that the fourth field of the application data shall be of the type unsigned integer?	1	0	

50.10 Does the OOSSS state that an error shall occur if the first telecommand to be reported is not found in the command schedule?	1	0	
50.11 Does the OOSSS state that the detailed schedule report shall contain all the static scheduling attributes for the selected telecommands?	1	0	
51. Questions about the detailed schedule report			
51.1 Does the OOSSS state that the telemetry source packet of a detailed schedule report shall have subtype 10?	1	0	
51.2 Does the OOSSS state that the first field of the source data shall be the N, that indicates the quantity of sets of telecommand packets is being reported?	1	0	
51.3 Does the OOSSS state that the first field of the source data shall be of the type unsigned integer?	1	0	
51.4 If the OOSSS supports the concept of sub-schedules, does the OOSSS state that the second field of the source data shall be the Sub-schedule ID, that indicates the sub-schedule to which the telecommand packet being reported is associated?	1	0	
51.5 If the OOSSS supports the concept of sub-schedules, does the OOSSS state that the second field of the source data shall be of the type enumerated?	1	0	
51.6 If the OOSSS supports the concept of interlocking, does the OOSSS state that the third field of the source data shall be the Interlock Set ID, that indicates the interlock that the telecommand packet being reported shall set?	1	0	
51.7 If the OOSSS supports the concept of interlocking, does the OOSSS state that the third field of the source data shall be of the type enumerated?	1	0	
51.8 If the OOSSS supports the concept of interlocking, does the OOSSS state that the fourth field of the source data shall be the Interlock Assessed ID, that indicates the interlock on which the release of the telecommand packet being reported is dependent?	1	0	
51.9 If the OOSSS supports the concept of interlocking, does the OOSSS state that the fourth field of the source data shall be of the type enumerated?	1	0	
51.10 If the OOSSS supports the concept of interlocking, does the OOSSS state that the fifth field of the source data shall be the Assessment Type, that indicates whether the telecommand packet being reported is dependent on the success or failure of the telecommand with which it is interlocked?	1	0	
51.11 If the OOSSS supports the concept of interlocking, does the OOSSS state that the fifth field of the source data shall be of the type enumerated?	1	0	
51.12 If the OOSSS supports the concept of relative time, does the OOSSS state that the sixth field of the source data shall be the Scheduling Event, that indicates the scheduling event to which the relative time is respected to?	1	0	
51.13 If the OOSSS supports the concept of relative time, does the OOSSS state that the sixth field of the source data shall be of the type enumerated?	1	0	

51.14 Does the OOSSS state that the seventh field of the source data shall be the Abs/Rel Time Tag, that indicates the time tag of the telecommand packet being reported?	1	0	
51.15 Does the OOSSS state that the seventh field of the source data shall be of the type absolute or relative time?	1	0	
51.16 If the reported telecommand packet has an execution timeout, does the OOSSS state that the eighth field of the source data shall be the Execution Timeout?	1	0	
51.17 If the reported telecommand packet has an execution timeout, does the OOSSS state that the eighth field of the source data shall be of the type Relative Time?	1	0	
51.18 Does the OOSSS state that the ninth field of the source data shall contain the Telecommand Packet being reported?	1	0	
51.19 Does the OOSSS state that a relative time shall be placed in the report when the absolute release time of the telecommand is still unknown?	1	0	
52. Question about the summary reporting of the command schedule			
52.1 Does the OOSSS state that the service request to a summary report of all telecommands in the command schedule shall have subtype 17?	1	0	
53. Questions about the reporting of a subset of the command schedule in summary form			
53.1 Does the OOSSS state that the service request to a report of a subset of the command schedule in summary form shall have subtype 12?	1	0	
53.2 Does the OOSSS state that an error shall occur if the first telecommand to be reported is not found in the command schedule?	1	0	
54. Questions about the summary schedule report			
54.1 Does the OOSSS state that the telemetry source packet of a summary schedule report shall have subtype 13?	1	0	
54.2 Does the OOSSS state that the first field of the source data shall be the N, that indicates the quantity of sets of telecommand packets is being reported?	1	0	
54.3 Does the OOSSS state that the first field of the source data shall be of the type unsigned integer?	1	0	
54.4 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the second field of the source data shall be the Sub-schedule ID, that indicates the sub-schedule to which the telecommand packet being reported is associated?	1	0	
54.5 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the second field of the source data shall be of the type enumerated?	1	0	
54.6 If the OOSS supports the concept of relative time, does the OOSSS state that the third field of the source data shall be the Scheduling Event, that indicates the scheduling event to which the relative time is respected to?	1	0	
54.7 If the OOSS supports the concept of relative time, does the OOSSS state that the third field of the source data shall be of the type enumerated?	1	0	
54.8 Does the OOSSS state that the fourth field of the source data shall be the Abs/Rel Time Tag, that indicates the time tag of the telecommand packet being reported?	1	0	

54.9 Does the OOSSS state that the fourth field of the source data shall be of the type absolute or relative time?	1	0	
54.10 Does the OOSSS state that the fifth field of the source data shall be the Application Process ID, that indicates (together with the Sequence Count) the telecommand packet being reported?	1	0	
54.11 Does the OOSSS state that the fifth field of the source data shall be of the type enumerated?	1	0	
54.12 Does the OOSSS state that the sixth field of the source data shall be the Sequence Count, that indicates (together with the APID) the telecommand packet being reported?	1	0	
54.13 Does the OOSSS state that the sixth field of the source data shall be of the type unsigned integer?	1	0	
55. Questions about the detailed reporting of the command schedule over a time period			
55.1 Does the OOSSS state that the service request to a detailed report of the command schedule over a time period shall have subtype 11?	1	0	
55.2 Does the OOSSS state that the first field of the application data shall be the Range?	1	0	
55.3 Does the OOSSS state that the first field of the application data shall be of the type enumerated?	1	0	
55.4 Does the OOSSS state that the second field of the application data shall be the Time Tag 1, that indicates the earliest or the latest absolute time of the telecommand packet to be reported?	1	0	
55.5 Does the OOSSS state that the second field of the application data shall be of the type absolute time?	1	0	
55.6 Does the OOSSS state that the third field of the application data shall be the Time Tag 2, that indicates the latest absolute time of the telecommand packet to be reported?	1	0	
55.7 Does the OOSSS state that the third field of the application data shall be of the type absolute time?	1	0	
55.8 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fourth field of the application data shall be N1, that indicates the number of sub-schedules of the telecommand packets to be reported?	1	0	
55.9 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fourth field of the application data shall be of the type unsigned integer?	1	0	
55.10 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fifth field of the application data shall be the Sub-schedule ID, that identifies the sub-schedule to which the telecommand packets to be reported are associated?	1	0	
55.11 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fifth field of the application data shall be of the type enumerated?	1	0	
55.12 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the sixth field of the application data shall be N2, that indicates the number of APIDs of telecommand packets to be reported?	1	0	
55.13 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the sixth field of the application data shall be of the type unsigned integer?	1	0	

55.14 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the seventh field of the application data shall be the Application Process ID, that identifies the destination application process from which telecommands shall be reported?	1	0	
55.15 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the seventh field of the application data shall be of the type enumerated?	1	0	
55.16 If the OOSS supports the concept of sub-schedule and the selective reporting of telecommands in a time range, does the OOSSS state that if $N1 = 0$, all telecommands that have release times falling in the specified absolute time period shall be reported?	1	0	
55.17 If the OOSS supports the concept of sub-schedule and the selective reporting of telecommands in a time range, does the OOSSS state that if $N1 > 0$ and $N2 = 0$, all telecommands which belong to the specified sub-schedule and have release times falling in the specified absolute time period shall be reported?	1	0	
55.18 If the OOSS supports the concept of sub-schedule and the selective reporting of telecommands in a time range, does the OOSSS state that if $N1 > 0$ and $N2 > 0$, all telecommands which have the specified destination application processes, belong to the specified sub-schedule and have release times falling in the specified absolute time period shall be reported?	1	0	
55.19 Does the OOSSS state that those telecommands whose absolute release times are not yet known shall not be included in the report?	1	0	
56. Questions about the summary reporting of the command schedule over a time period			
56.1 Does the OOSSS state that the service request to a summary report of the command schedule over a time period shall have subtype 14?	1	0	
56.2 Does the OOSSS state that the first field of the application data shall be the Range?	1	0	
56.3 Does the OOSSS state that the first field of the application data shall be of the type enumerated?	1	0	
56.4 Does the OOSSS state that the second field of the application data shall be the Time Tag 1, that indicates the earliest or the latest absolute time of the telecommand packet to be reported?	1	0	
56.5 Does the OOSSS state that the second field of the application data shall be of the type absolute time?	1	0	
56.6 Does the OOSSS state that the third field of the application data shall be the Time Tag 2, that indicates the latest absolute time of the telecommand packet to be reported?	1	0	
56.7 Does the OOSSS state that the third field of the application data shall be of the type absolute time?	1	0	
56.8 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fourth field of the application data shall be $N1$, that indicates the number of sub-schedules of the telecommand packets to be reported?	1	0	
56.9 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fourth field of the application data shall be of the type unsigned integer?	1	0	

56.10 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fifth field of the application data shall be the Sub-schedule ID, that identifies the sub-schedule to which the telecommand packets to be reported are associated?	1	0	
56.11 If the OOSS supports the concept of sub-schedule, does the OOSSS state that the fifth field of the application data shall be of the type enumerated?	1	0	
56.12 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the sixth field of the application data shall be N2, that indicates the number of APIDs of telecommand packets to be reported?	1	0	
56.13 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the sixth field of the application data shall be of the type unsigned integer?	1	0	
56.14 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the seventh field of the application data shall be the Application Process ID, that identifies the destination application process from which telecommands shall be reported?	1	0	
56.15 If the OOSS supports the selective reporting of telecommands in a time range, does the OOSSS state that the seventh field of the application data shall be of the type enumerated?	1	0	
56.16 If the OOSS supports the concept of sub-schedule and the selective reporting of telecommands in a time range, does the OOSSS state that if N1 = 0, all telecommands that have release times falling in the specified absolute time period shall be reported?	1	0	
56.17 If the OOSS supports the concept of sub-schedule and the selective reporting of telecommands in a time range, does the OOSSS state that if N1 > 0 and N2 = 0, all telecommands which belong to the specified sub-schedule and have release times falling in the specified absolute time period shall be reported?	1	0	
56.18 If the OOSS supports the concept of sub-schedule and the selective reporting of telecommands in a time range, does the OOSSS state that if N1 > 0 and N2 > 0, all telecommands which have the specified destination application processes, belong to the specified sub-schedule and have release times falling in the specified absolute time period shall be reported?	1	0	
56.19 Does the OOSSS state that those telecommands whose absolute release times are not yet known shall not be included in the report?	1	0	
57. Question about the reporting of the status of the command schedule			
57.1 Does the OOSSS state that the service request to a report status of the command schedule shall have subtype 18?	1	0	
58. Questions about the command schedule status report			
58.1 Does the OOSSS state that the telemetry source packet of a command schedule status report shall have subtype 19?	1	0	
58.2 If the OOSS supports the concept of sub-schedules, does the OOSSS state that the first field of the source data shall be the N1, that indicates the quantity of sets of telecommand packets is being reported?	1	0	
58.3 Does the OOSSS state that the first field of the source data shall be of the type unsigned integer?	1	0	

58.4 If the OOS supports the concept of sub-schedules, does the OOS state that the second field of the source data shall be the Sub-schedule ID, that indicates the sub-schedule being reported?	1	0	
58.5 If the OOS supports the concept of sub-schedules, does the OOS state that the second field of the source data shall be of the type enumerated?	1	0	
58.6 If the OOS supports the concept of sub-schedules, does the OOS state that the third field of the source data shall be the Status, that indicates the status of the corresponding sub-schedule?	1	0	
58.7 If the OOS supports the concept of sub-schedules, does the OOS state that the third field of the source data shall be of the type enumerated?	1	0	
58.8 If the OOS supports the concept of sub-schedules, does the OOS state that the third field of the source data shall have one of the following values?	1	0	
58.8.1 value = 0 (Disabled)			
58.8.2 value = 1 (Enabled)			
58.9 Does the OOS state that the fourth field of the source data shall be the N2, that indicates the quantity of application processes within the corresponding sub-schedule being reported?	1	0	
58.10 Does the OOS state that the fourth field of the source data shall be of the type unsigned integer?	1	0	
58.11 Does the OOS state that the fifth field of the source data shall be the Application Process ID, that identifies the application process within the corresponding sub-schedule being reported?	1	0	
58.12 Does the OOS state that the fifth field of the source data shall be of the type enumerated?	1	0	
58.13 Does the OOS state that the sixth field of the source data shall be the Status, that indicates the status of the corresponding application process?	1	0	
58.14 Does the OOS state that the sixth field of the source data shall be of the type enumerated?	1	0	
58.15 Does the OOS state that the sixth field of the source data shall have one of the following values?	1	0	
58.15.1 value = 0 (Disabled)			
58.15.2 value = 1 (Enabled)			