IEEE 802.19.1a
Wireless Coexistence

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| Text proposal on amendment to entity operations |
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Abstract

This document provides text proposal on amendment to entity operations in section 6. Basically, the proposal includes the amendment for reflecting current regulatory rules. In the following, technical amendments as shown in the supplemental document 802.19-16/0052r1 are highlighted by yellow.

r1 provides typo modifications and some editorial changes.

Yellow highlight represents technical changes described in the supplemental document 802.19-16/0052r1.

**6.2 CDIS operation**

**6.2.4 Profile 3**

**6.2.4.2 WSO registration**

After the CDIS has received a ***CMRegistrationRequest*** message from a CM indicating new registration, the CDIS shall perform the WSO registration procedure described in 5.2.2.1. The CDIS shall generate and send the ***RegistrationResponse*** message to the CM.

The following table shows ***CxMessage*** fields in ***RegistrationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***registrationResponse*** |

The following table shows ***registrationResponse*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***status*** | ***Status*** | ***status*** |

* + - 1. **WSO registration update**

After the CDIS has received a ***CMRegistrationRequest*** message from a CM indicating registration update, the CDIS shall perform the WSO registration update procedure described in 5.2.2.2. The CDIS shall generate and send the ***RegistrationResponse*** message to the CM.

The following table shows ***CxMessage*** fields in ***RegistrationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***registrationResponse*** |

The following table shows ***registrationResponse*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***status*** | ***Status*** | status |

* + - 1. **Obtaining coexistence set information**

After the CDIS has received a ***CoexistenceSetInformationRequest*** message from a CM, the CDIS shall perform the obtaining coexistence information procedure described in 5.2.3.1. The CDIS shall generate and send the ***CoexistenceSetInformationResponse*** message to the CM.

The following table shows ***CxMessage*** fields in ***CoexistenceSetInformationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***coexistenceSetInformationResponse*** |

The following table shows ***CoexistenceSetInformationResponse*** payload elements.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***networkID***  | ***OCTET STRING*** | Subject network ID for coexistence set information |
| ***listOfNeighborCMs*** | ***ListOfNeighborCMs*** | As specified in following table |
| ***listOfMasterCMCandidate*** | ***ListOfMasterCMCandidate*** | As specified in following table |

The following table shows ***ListOfNeighborCMs*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cmID*** | ***CxID*** | CM ID |
| ***listOfNeighborCEs*** | ***ListOfNeighborCEs*** | As shown in following table |

The following table shows ***ListOfNeighborCEs*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***ceID*** | ***CxID*** | CE ID |
| ***listOfNeighborWSOs*** | ***ListOfNeighborWSOs*** | As shown in following table |

The following table shows ***ListOfNeighborWSOs*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***wsoID*** | ***OCTET STRING*** | WSO ID |
| ***networkTechnology*** | ***NetworkTechnology*** | Network technology |
| ***networkGeometryClass*** | ***NetworkGeometryClass*** | class1: Network geometry class 1class2: Network geometry class 2class3: Network geometry class 3class4: Network geometry class 4class5-x: Others if available |
| ***listOfAvailableFrequencies*** | ***ListOfAvailableFrequencies*** | As shown in following table |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | As shown in following table |

The following table shows ***ListOfAvailableFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***timestamp*** | ***GeneralizedTime*** | Shall be set to indicate the time of obtaining available frequency by WSO, if available.  |
| ***frequencyRange*** | ***FrequencyRange*** | Shall be set to indicate the available frequency range. |
| ***txPowerLimit*** | ***REAL*** | Shall be set to indicate the power limit in the available frequency range. |
| ***availableStartTime*** | ***GeneralizedTime*** | Shall be set to indicate start time of the available frequency range if applicable. |
| ***availableStopTime*** | ***GeneralizedTime*** | Shall be set to indicate stop time of the available frequency range if applicable. |
| ***maxTotalBandwidth*** | ***REAL*** | Shall be set to indicate maximum total bandwidth of one channel, if available |
| ***maxContiguousBandwidth*** | ***REAL*** | Shall be set to indicate maximum channel bandwidth that can be used contiguously, if available |
| ***resolutionBandwidth*** | ***REAL*** | Shall be set to indicate resolution bandwidth if available |
| ***typeOfAvailablefrequency*** | ***TypeOfAvailableFrequency*** | Shall be set to indicate “generic” or “specific”, if available |
| ***locationValidity*** | ***REAL*** | Shall be set to indicate radius of the circle centered on the reported ge-location of the WSO, outside of which the available frequencies are not valid, if this parameter is available. |
| ***aggInterfControlParam*** | ***AggregatedInterferenceControlParameters*** | May be set to indicate the parameters of aggregate interference control if available as specified in following table |

The following table shows ***AggregatedInterferenceControlParameters*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***referencePointID*** | ***INTEGER*** | Reference point ID to be protected in controlling aggregated interference from the other WSO(s) |
| ***installationParameters*** | ***InstallationParameters*** | Installation parameters of reference point |
|  |  |  |
|  |  |  |
|  |  |  |
| ***protectionRatio*** | ***REAL*** | Protection ratio of the reception to be protected at the reference point for the frequency if available |

The following table shows ***InstallationParameters*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***geolocation*** | ***Geolocation*** | Shall be set to indicate the geolocation of reference point antenna. |
| ***antennaCharacteristics*** | ***AntennaCharacteristics*** | Shall be set to indicate the antenna characteristics |
| ***maxTxPower*** | ***REAL*** | Not used here. |
| ***aCLR*** | ***REAL*** | Not used here. |
| ***aCS*** | ***REAL*** | Adjacent Channel Selectivity |
| ***guaranteedQoSOfBackhaulConnection*** | ***GuaranteedQoSOfBackhaulConnection*** | Not used here. |

The following table shows ***AntennaCharacteristics*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***antennaHeight*** | ***REAL*** | Shall be set to indicate the antenna height of WSO, if available. |
| ***antennaHeightType*** | ***HeightType*** | Shall be set to indicate the antenna height type, if available. “agl” or “asl” is indicated. |
| ***antennaGain*** | ***REAL*** | Shall be set to indicate the antenna gain if available |

|  |  |  |
| --- | --- | --- |
|  |  |  |
|  |  |  |

The following table shows ***listOfOperatingFreqeuencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***frequencyRange*** | ***FrequencyRange*** | Operating frequency range |

The following table shows ***listOfMasterCMCandidate*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cmID*** | ***CxID*** | CM ID |
| ***ipAddress*** | ***OCTET STRING*** | IP address of the subject CM |
| ***portNumber*** | ***INTEGER*** | Its port number |

**6.3 CM operation**

**6.3.4 Profile 3**

**6.3.4.2 WSO subscription**

After the CM has received a ***SubscriptionRequest*** message from a CE indicating a new subscription, the CM shall perform the subscription procedure described in 5.2.1.1. The CM shall generate and send the ***SubscriptionResponse*** message to the CE.

***CxMessage*** fields in ***SubscriptionResponse*** message are shown in the following table.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***subscriptionResponse*** |

The following table shows the parameters in the ***subscriptionResponse*** payload.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***serverID*** | ***IA5String*** | Server ID |
| ***serverPassword*** | ***IA5String*** | Server Password |
| ***status*** | ***Status*** | status |

* + - 1. **WSO subscription update**

After the CM has received a ***SubscriptionRequest*** message from a CE indicating a subscription change, the CM shall perform the subscription update procedure described in 5.2.1.2. The CM shall generate and send the ***SubscriptionResponse*** message to the CE.

The following table shows ***CxMessage*** fields in ***SubscriptionResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***subscriptionResponse*** |

The following table shows ***SubscriptionResponse*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***serverID*** | ***IA5String*** | Server ID |
| ***serverPassword*** | ***IA5String*** | Server Password |
| ***status*** | ***Status*** | status |

* + - 1. **Subscription change**

When a CM requires to change the subscription of a WSO, the CM shall perform the subscription change procedure described in 5.2.1.5. The CM shall generate and send the ***SubscriptionChangeRequest*** message to the CE serving this WSO.

The following table shows ***CxMessage*** fields in ***SubscriptionChangeRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***subscriptionChangeRequest*** |

Table below shows ***SubscriptionChangeRequest*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***coexistenceService*** | ***CoexistenceService*** | Set to “information” if the intent is to update the service subscription to the information service.Set to “management” if the intent is to update the service subscription to the management service. |

* + - 1. **WSO registration**

After the CM has received a ***CERegistrationRequest*** message from a CE indicating a new registration, the CM shall perform the WSO registration procedure described in 5.2.2.1. The CM shall generate and send the ***RegistrationResponse*** message to the CE.

The following table shows ***CxMessage*** fields in ***RegistrationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***registrationResponse*** |

The following table shows ***RegistrationResponse*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***status*** | ***Status*** | status |

Also, the CM shall generate and send the ***CMRegistrationRequest*** message to the CDIS to which this CM is subscribed.

The following table shows ***CxMessage*** fields in ***CMRegistrationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***cmRegistrationRequest*** |

The following table shows ***CMRegistrationRequest*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cmProfile*** | ***EntityProfile*** | Shall be set to indicate the entity profile |
| ***cmRegistration*** | ***CMRegistration*** | As specified in following table |
| ***ceRegistration*** | ***CERegistration*** | As specified in following table |
| ***operationCode*** | ***OperationCode*** | Shall be set to indicate that information is new. |
| ***cmID*** | ***CxID*** | CM ID |
| ***maximumNumberOfControllableWSO*** | ***INTEGER*** | Maximum number of controllable WSOs |

The following table shows ***CMRegistration*** information element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***ipAddress*** | ***OCTET STRING*** | IP address |
| ***portNumber*** | ***INTEGER*** | Port number |

The following table shows ***CERegistration*** information element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***ceID*** | ***CxID*** | CE ID |
| ***listOfWSORegistrations*** | ***ListOfWSORegistrations*** | As specified in following table |

The following table shows ***ListOfWSORegistrations*** information element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***wsoID*** | ***OCTET STRING*** | WSO ID |
| ***wsoDescriptor*** | ***WSODescriptor*** | As specified in following table |
|  |  |  |
| ***networkID*** | ***OCTET STRING*** | Network ID |
|  |  |  |
| ***coverageArea*** | ***CoverageArea*** | As specified in following table |
| ***installationParameters*** | ***InstallationParameters*** | As specified in following table |
| ***listOfAvailableFrequencies*** | ***ListOfAvailableFrequencies*** | As specified in following table |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | As specified in following table |
|  |  |  |
|  |  |  |
| ***maximumNumberOfControllableWSO*** | ***INTEGER*** | Optionally present |

The following table shows ***WSODescriptor*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***networkType*** | ***NetworkType*** | Shall be set to indicate network type as specified in regulations if available.“fixed”, “mode1” and “mode2” are prepared for US rule in TV band.“typeA” and “typeB” are prepared for EU rule in TV band. |
| ***emissionClass*** | ***EmissionClass*** | Class 1, Class 2, Class 3, Class 4, Class 5 |
| ***wsoType*** | ***wsoType*** | Shall be set to indicate the type of WSO, if available. “master” or “slave” is indicated. |
| ***networkTechnology*** | ***NetworkTechnology*** | Shall be set to indicate current operating network technology |
| ***addNetworkTechnology*** | ***SEQUENCE OF NetworkTechnology*** | Optionally present. If present, this parameter shall be set to indicate the sequence of its operable network technology type(s) |
| ***wsoRegulatoryID*** | ***OCTET STRING*** | Shall be set to indicate the regulatory ID of WSO. |

The following table shows ***CoverageArea*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***radius*** | ***REAL*** | Shall be set to indicate the radius of coverage area of the WSO.. |

The following table shows ***InstallationParameters*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***geolocation*** | ***Geolocation*** | Shall be set to indicate the geolocation of WSO antenna. |
|  |  |  |
|  |  |  |
| ***antennaCharacteristics*** | ***AntennaCharacteristics*** | Shall be set to indicate the antenna characteristics |
| ***maxTxPower*** | ***REAL*** | Shall be set to indicate the maximum transmission power level if applicable. |
| ***aCLR*** | ***REAL*** | Adjacent Channel Leakage Ratio |
| ***aCS*** | ***REAL*** | Adjacent Channel Selectivity |
| ***guaranteedQoSOfBackhaulConnection*** | ***GuaranteedQoSOfBackhaulConnection*** | Shall be set to indicate the guaranteed QoS of backhaul connection as specified in following table, if available. |

The following table shows ***Geolocation*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***coordinates*** | ***Coordinates*** | Shall be set to indicate the coordinates of WSO, if available. |
| ***locationUncertainty*** | ***REAL*** | Shall be set to indicate the location uncertainty if available |

The following table shows ***Coordinates*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***longitude*** | ***REAL*** | Shall be set to indicate the longitude of WSO. |
| ***latitude*** | ***REAL*** | Shall be set to indicate the latitude of WSO |
| ***altitude*** | ***REAL*** | Shall be set to indicate the altitude of WSO |

The following table shows ***AntennaCharacteristics*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***antennaHeight*** | ***REAL*** | Shall be set to indicate the antenna height of WSO, if available. |
| ***antennaHeightType*** | ***HeightType*** | Shall be set to indicate the antenna height type, if available. “agl” or “asl” is indicated. |
| ***antennaGain*** | ***REAL*** | Shall be set to indicate the antenna gain if available |

The following table shows ***ListOfAvailableFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***timestamp*** | ***GeneralizedTime*** | Shall be set to indicate the time of obtaining available frequency by WSO, if available.  |
| ***frequencyRange*** | ***FrequencyRange*** | Shall be set to indicate the available frequency range. |
| ***txPowerLimit*** | ***REAL*** | Shall be set to indicate the power limit in the available frequency range. |
| ***availableStartTime*** | ***GeneralizedTime*** | Shall be set to indicate start time of the available frequency range if applicable. |
| ***availableStopTime*** | ***GeneralizedTime*** | Shall be set to indicate stop time of the available frequency range if applicable. |
| ***maxTotalBandwidth*** | ***REAL*** | Maximum total bandwidth of one channel, if available |
| ***maxContiguousBandwidth*** | ***REAL*** | Maximum channel bandwidth that can be used contiguously, if available |
| ***resolutionBandwidth*** | ***REAL*** | Resolution bandwidth if available |
| ***typeOfAvailablefrequency*** | ***TypeOfAvailableFrequency*** | “generic” or “specific” if available |
| ***aggInterfControlParam*** | ***AggregatedInterferenceControlParameters*** | Optionally present. If available, set to indicate as specified in following table |

The following table shows ***AggregatedInterferenceControlParameters*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***referencePointID*** | ***INTEGER*** | Reference point ID to be protected in controlling aggregated interference from the other WSO(s) |
| ***installationParameters*** | ***InstallationParameters*** | Installation parameters of reference point |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |
| ***protectionRatio***  | ***REAL*** | Protection ratio of the reception to be protected at the reference point for the frequency if available |

The following table shows ***ListOfOperatingFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***frequencyRange*** | ***FrequenyRange*** | Shall be set to indicate the frequency range in which the WSO currently operates.  |
| ***txPower*** | ***REAL*** | Shall be set to indicate the transmission power of the WSO in *frequencyRange.* |
| ***resolutionBandwidth*** | ***REAL*** | Shall be set to indicate the resolution bandwidth of available frequency where WSO is operating, if applicable.  |
| ***occupancy*** | ***REAL*** | Optionally present. If present, this parameter shall be set to indicate occupancy of the WSO frequency range. |

The following table shows ***GuaranteedQoSOfBackhaulConnection*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***backhaulTypeID*** | ***BackhaulTypeID*** | Shall be set to indicate backhaul type of the WSO.  |
| ***guaranteedMinimumBitRates*** | ***REAL*** | Shall be set to indicate the guaranteed maximum latency of its backhaul connection. |
| ***guaranteedMaximumLatency*** | ***REAL*** | Optionally present. If present, this parameter shall be set to indicate the guaranteed maximum latency of its backhaul connection. |

* + - 1. **WSO registration update**

After the CM has received a ***CERegistrationRequest*** message from a CE indicating a registration update, the CM shall perform the WSO registration update procedure described in 5.2.2.2. The CM shall generate and send the ***RegistrationResponse*** message to the CE.

The following table shows ***CxMessage*** fields in ***RegistrationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***registrationResponse*** |

The following table shows the parameters in the ***registrationResponse*** payload.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***status*** | ***Status*** | ***status*** |

Also, the CM shall generate and send the ***CMRegistrationRequest*** message to the CDIS to which this CM is subscribed.

The following table shows ***CxMessage*** fields in ***CMRegistrationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***cmRegistrationRequest*** |

The following table shows ***cmRegistrationRequest*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cmProfile*** | ***EntityProfile*** | Shall be set to indicate the entity profile |
| ***cmRegistration*** | ***CMRegistration*** | As specified in following table if any update |
| ***ceRegistration*** | ***CERegistration*** | As specified in following table if any update |
| ***operationCode*** | ***OperationCode*** | Shall be set to indicate that information is updated/to-be-deleted. |
| ***cmID*** | ***CxID*** | CM ID |

The following table shows ***CMRegistration*** information element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***ipAddress*** | ***OCTET STRING*** | IP address |
| ***portNumber*** | ***INTEGER*** | Port number |

The following table shows ***CERegistration*** information element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***ceID*** | ***CxID*** | CE ID |
| ***listOfWSORegistrations*** | ***ListOfWSORegistrations*** | As specified in following table |

The following table shows ***ListOfWSORegistrations*** information element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***operationCode*** | ***OperationCode*** | Shall be set to indicate that information is update/to-be-deleted. |
| ***wsoID*** | ***OCTET STRING*** | WSO ID |
| ***wsoDescriptor*** | ***WsoDescriptor*** | As specified in 6.3.4.5 |
|  |  |  |
|  |  |  |
| ***coverageArea*** | ***CoverageArea*** | As specified in 6.3.4.5 if any update |
| ***installationParameters*** | ***InstallationParameters*** | As specified in 6.3.4.5 if any update |
| ***listOfAvailableFrequencies*** | ***ListOfAvailableFrequencies*** | As specified in 6.3.4.5 if any update |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | As specified in 6.3.4.5 if any update |
|  |  |  |
|  |  |  |

* + - 1. **Reconfiguration**

When a CM is required to reconfigure a WSO, the CM shall perform the WSO reconfiguration procedure described in 5.2.10.1. The CM shall generate and send the ***ReconfigurationRequest*** message to the CE serving this WSO.

The following table shows ***CxMessage*** fields in ***ReconfigurationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***reconfigurationRequest*** |

The following table shows ***reconfigurationRequest*** fields in ***ReconfigurationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***wsoID*** | ***OCTET STRING*** | WSO ID. |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | Operating frequency information allocated for the WSO. |
|  |  |  |
|  |  |  |
| ***newNetworkTechnology*** | ***NetworkTechnology*** | Optionally present. If present, this parameter shall be set to indicate its WSO network technology type(s) to be reconfigured. |

* + - 1. **Obtaining coexistence set information**

When a CM is required to obtain coexistence set information, the CM shall perform the obtaining coexistence set information procedure described in 5.2.3.1. The CM shall generate and send the ***CoexistenceSetInformationRequest*** message to the CDIS to which this CM is subscribed.

The following table shows ***CxMessage*** fields in ***CoexistenceSetInformationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***coexistenceSetInformationRequest*** |

The following table shows the parameters in the ***coexistenceSetInformationRequest*** payload.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***listOfNetworkID*** | ***SEQUENCE OF OCTET STRING*** | List of network ID |
| ***operationCode*** | ***OperationCode*** | Shall be set to indicate that is new-request/update-request/stop-request. |

* + - 1. **Providing coexistence report**

When a CM requires to provide a coexistence report to a WSO, the CM shall perform the providing coexistence report procedure described in 5.2.3.6. The CM shall generate and send the ***CoexistenceReportResponse*** message to the CE that serves this WSO.

The following table shows ***CxMessage*** fields in ***CoexistenceReportResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***coexistenceReportResponse*** |

The following table shows the parameters in the ***coexistenceReportResponse*** payload.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***coexistenceReport*** | ***CoexistenceReport*** | ***coexistenceReport*** |

The following table shows the parameters in the ***coexistenceReport***

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***networkID*** | ***OCTET STRING*** | Network ID |
| ***wsoID*** | ***OCTET STRING*** | WSO ID |
| ***listOfRecommendedOperationFrequencies*** | ***ListOfRecommendedOperationFrequencies*** | As specified in following table |

The following table shows ***ListOfRecommendedOperationFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***frequencyRange*** | ***FrequencyRange*** | Shall be set to indicate the recommended operation frequency range. |
| ***txPowerLimit*** | ***REAL*** | Shall be set to indicate the power limit in the frequency range. |
| ***availableStartTime*** | ***GeneralizedTime*** | Shall be set to indicate start time of the recommended operation frequency range if applicable. |
| ***availableStopTime*** | ***GeneralizedTime*** | Shall be set to indicate stop time of the operation recommended frequency range if applicable. |
| ***resolutionBandwidth*** | ***REAL*** | Shall be set to indicate the resolution bandwidth of available frequency where WSO is operating, if applicable.  |
| ***locationValidity*** | ***REAL*** | Shall be set to indicate radius of the circle centered on the reported geo-location of the WSO, outside of which the recommended operation frequencies are not valid, if this parameter is available. |

* + - 1. **Master/Slave CM configuration**

When a CM requires to start a master/slave configuration, the CM shall perform the master/slave configuration procedure described in 5.2.9.2. The CM shall generate and send the ***MasterSlaveCMConfigurationRequest*** message to the CM with which it requires to do master/slave configuration.

The following table shows ***CxMessage*** fields in ***MasterSlaveCMConfigurationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***masterSlaveCMConfigurationRequest*** |

The following table shows the parameters in the ***masterSlaveCMConfigurationRequest*** payload.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cmID*** | ***CxID*** | Subject CM ID |
| ***operationCode*** | ***OperationCode*** | Shall be set to indicate that subject configuration request is new/update/ deleted. |
| ***cmProfile*** | ***EntityProfile*** | Shall be set to indicate the entity profile |
| ***ceRegistration*** | ***CERegistration*** | As specified in 6.3.4.6 |

The CM shall send ***MasterSlaveCMConfigurationResponse*** to the subject CM when receiving ***MasterSlaveCMConfigurationRequest*** from the subject CM.

The following table shows ***CxMessage*** fields in ***MasterSlaveCMConfigurationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***masterSlaveCMConfigurationResponse*** |

The following table shows the parameters in ***MasterSlaveCMConfigurationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***status*** | ***Status*** | status |

* + - 1. **Sending reconfiguration request from CM to another CM**

When a CM 1 is required to reconfigure a WSO served by a CM 2, the CM 1 shall perform the sending reconfiguration request from CM to another CM procedure described in 5.2.10.2. The CM shall generate and send the ***CMReconfigurationRequest*** message to CM 2.

The following table shows ***CxMessage*** fields in ***CMReconfigurationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***cmReconfigurationRequest*** |

The following table shows ***cmReconfigurationRequest*** fields in ***CMReconfigurationRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***wsoID*** | ***OCTET STRING*** | WSO ID. |
| ***cmID*** | ***cxID*** | Subject CE ID |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | As specified in 6.3.4.5 if any update |
|  |  |  |
|  |  |  |
| ***newNetworkTechnology*** | ***NetworkTechnology*** | Optionally present. If present, this parameter shall be set to indicate its WSO network technology type(s) to be reconfigured |
|  |  |  |

CM 2 shall send the ***CMReconfigurationResponse*** message to CM 1 after it has received the ***CMReconfigurationRequest*** message from CM 1.

The following table shows ***CxMessage*** fields in ***CMReconfigurationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***cmReconfigurationResponse*** |

The following table shows ***cmReconfigurationResponse*** fields in ***CMReconfigurationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***status*** | ***Status*** | status |

* 1. **CE operation**
		1. **Profile 3**
			1. **WSO subscription**

After start-up, a CE shall perform the WSO subscription procedure described in 5.2.1.1. The CE shall send the ***CxMediaSubscriptionRequest*** primitive to the WSO/RLSS it serves and shall wait for the ***CxMediaSubscriptionResponse*** primitive from this WSO/RLSS. After the CE has received the ***CxMediaSubscriptionResponse*** primitive from the WSO/RLSS, the CE shall generate and send the ***SubscriptionRequest*** message to the CM to which it prefers to subscribe.

The following table shows ***CxMessage*** fields in ***SubscriptionRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***subscriptionRequest*** |

The following table shows ***subscriptionRequest*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***clientID*** | ***IA5String*** | WSO subscription identifier |
| ***clientPassword*** | ***IA5String*** | WSO subscription password |
| ***coexistenceService*** | ***CoexistenceService*** | Set to “information” if the intent is to subscribe to the information service.Set to “management” if the intent is to subscribe to the management service. |

The CE shall send the ***CxMediaSubscriptionConfirm*** primitive to the WSO/RLSS after it has received the ***SubscriptionResponse*** message from the CM.

The following table shows ***CxMediaSubscriptionConfirm*** primitive.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cxMediaStatus*** | ***CxMediaStatus*** | cxMediaStatus |

* + - 1. **WSO subscription update**

After a CE has received a ***CxMediaSubscriptionIndication*** primitive from the WSO/RLSS it serves, the CE shall perform the WSO subscription update procedure described in 5.2.1.2. The CE shall generate and send the ***SubscriptionRequest*** message to the CM to which it is subscribed.

The following table shows ***CxMessage*** fields in ***SubscriptionRequest*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***subscriptionRequest*** |

The following table shows ***subscriptionRequest*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***clientID*** | ***IA5String*** | WSO subscription identifier |
| ***clientPassword*** | ***IA5String*** | WSO subscription password |
| ***coexistenceService*** | ***CoexistenceService*** | Set to “information” if the intent is to subscribe to the information service.Set to “management” if the intent is to subscribe to the management service.Set to “noService” if the intent is to stop the service subscription |

The CE shall send the ***CxMediaSubscriptionConfirm*** primitive to the WSO/RLSS after it has received the ***SubscriptionResponse*** message from the CM.

The following table shows ***CxMediaSubscriptionConfirm*** primitive.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cxMediaStatus*** | ***cxMediaStatus*** | **cxMediaStatus** |

* + - 1. **Subscription change**

After a CE has received a ***SubscriptionChangeRequest*** message from the CM to which it is subscribed, the CE shall perform the subscription change procedure described in 5.2.1.5. The CE shall generate and send the ***CxMediaChangeSubscriptionRequest*** primitive to the WSO/RLSS that is serves.

The following table shows ***CxMediaChangeSubscriptionRequest*** primitives.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***coexistenceService*** | ***CoexistenceService*** | Set to “information” if the intent is to update the service subscription to the information service.Set to “management” if the intent is to update the service subscription to the management service. |

Also, the CE shall send the ***SubscriptionChangeResponse*** message to the CM after it has received the ***CxMediaChangeSubscriptionResponse*** primitive from the WSO/RLSS.

The following table shows ***CxMessage*** fields in ***SubscriptionChangeResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***subscriptionChangeResponse*** |

The following table shows ***SubscriptionChangeResponse*** payload element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***status*** | ***Status*** | ***status*** |

* + - 1. **WSO registration**

After a CE has performed the WSO subscription procedure, the CE shall perform the WSO registration procedure described in 5.2.2.1. The CE shall generate and send the ***CERegistrationRequest*** message to the CM to which it is subscribed.

The following table shows ***CxMessage*** fields in ***CERegistrationRequest*** message when requesting registration.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***ceRegistrationRequest*** |

The following table shows ***CERegistrationRequest*** payload element for one WSO when requesting registration.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***operationCode*** | ***OperationCode*** | Shall be set to indicate new registration as “new.” |
| ***wsoID*** | ***OCTET STRING*** | WSO ID |
| ***networkID*** | ***OCTET STRING*** | Identifier of the network to which the WSO belongs. |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |
| ***wsoDescriptorWSODescriptor***Shall be set to indicate the WSO parameters as specified in the following table.***installationParameters*** | ***InstallationParameters*** | As specified in following table. |
| ***listOfAvailableFrequencies*** | ***ListOfAvailableFrequencies*** | As specified in following table. |
| ***txScheduleSupported*** | ***BOOLEAN*** | Shall be set to a value that represents the WSO’s capability to support transmit scheduling. |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | As specified in following table. |
| ***listOfSuppFrequencies*** | ***ListOfSupportedFrequencies*** | As specified in following table. |
|  |  |  |
| ***requiredResource*** | ***RequiredResource*** | As specified in following table. |
| ***mobilityInformation*** | ***MobilityInformation*** | As specified in following table. |

The following table shows ***WSODescriptor*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***networkType*** | ***NetworkType*** | Shall be set to indicate network type as specified in regulations if available.“fixed”, “mode1” are “mode2” are prepared for US rule in TV band.“typeA” and “typeB” are prepared for EU rule in TV band. |
| ***emissionClass*** | ***EmissionClass*** | class1, class2, class3, class4 or class5 |
| ***wsoType*** | ***wsoType*** | Shall be set to indicate the type of WSO. “master” or “slave” is indicated.. |
| ***networkTechnology*** | ***NetworkTechnology*** | Shall be set to indicate current operating network technology |
| ***addNetworkTechnology*** | ***SEQUENCE OF NetworkTechnology*** | Optionally present. If present, this parameter shall be set to indicate the sequence of its operable network technology type(s) |
| ***wsoRegulatoryID*** | ***OCTET STRING*** | Shall be set to indicate the regulatory ID of WSO. |

The following table shows ***Geolocation*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***coordinates*** | ***Coordinates*** | Shall be set to indicate the coordinates of WSO, if available. |
| ***locationUncertainty*** | ***REAL*** | Shall be set to indicate the antenna gain if available |

The following table shows ***Coordinates*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***longitude*** | ***REAL*** | Shall be set to indicate the longitude of WSO. |
| ***latitude*** | ***REAL*** | Shall be set to indicate the latitude of WSO |
| ***altitude*** | ***REAL*** | Shall be set to indicate the altitude of WSO |

The following table shows ***InstallationParameters*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***geolocation*** | ***Geolocation*** | Shall be set to indicate the geolocation information of WSO if available. |
|  |  |  |
|  |  |  |
| ***antennaCharacteristics*** | ***AntennaCharacteristics*** | Shall be set to indicate the antenna information of WSO |
| ***maxTxPower*** | ***REAL*** | Shall be set to indicate the maximum transmission power level if applicable |
| ***aCLR*** | ***REAL*** | Adjacent Channel Leakage Ratio |
| ***aCS*** | ***REAL*** | Adjacent Channel Selectivity |
| ***guaranteedQoSOfBackhaulConnection*** | ***GuaranteedQoSOfBackhaulConnection*** | Shall be set to indicate the guaranteed QoS of backhaul connection as specified in following table, if available |

The following table shows ***AntennaCharacteristics*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***antennaHeight*** | ***REAL*** | Shall be set to indicate the antenna height of WSO, if available. |
| ***antennaHeightType*** | ***HeightType*** | Shall be set to indicate the antenna height type, if available. “agl” or “asl” is indicated. |
| ***antennaGain*** | ***REAL*** | Shall be set to indicate the antenna gain if available |

The following table shows ***GuaranteedQoSOfBackhaulConnection*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***backhaulTypeID*** | ***BackhaulTypeID*** | Shall be set to indicate backhaul type of the WSO.  |
| ***guaranteedMinimumBitRates*** | ***REAL*** | Shall be set to indicate the guaranteed maximum latency of its backhaul connection |
| ***guaranteedMaximumLatency*** | ***REAL*** | Optionally present. If present, this parameter shall be set to indicate the guaranteed maximum latency of its backhaul connection |

The following table shows ***ListOfAvailableFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***timestamp*** | ***GeneralizedTime*** | Shall be set to indicate the time of obtaining available frequency by WSO, if available.  |
| ***frequencyRange*** | ***FrequencyRange*** | Shall be set to indicate the available frequency range. |
| ***txPowerLimit*** | ***REAL*** | Shall be set to indicate the power limit in the available frequency range. |
| ***availableStartTime*** | ***GeneralizedTime*** | Shall be set to indicate start time of the available frequency range if applicable. |
| ***availableStopTime*** | ***GeneralizedTime*** | Shall be set to indicate stop time of the available frequency range if applicable. |
| ***maxTotalBandwidth*** | ***REAL*** | Maximum total bandwidth of one channel, if available |
| ***maxContiguousBandwidth*** | ***REAL*** | Maximum channel bandwidth that can be used contiguously, if available |
| ***resolutionBandwidth*** | ***REAL*** | Resolution bandwidth if available |
| ***typeOfAvailablefrequency*** | ***TypeOfAvailableFrequency*** | “generic” or “specific” if available |
| ***locationValidity*** | ***REAL*** | Shall be set to indicate radius of the circle centered on the reported ge-location of the WSO, outside of which the available frequencies are not valid, if this parameter is available. |
| ***aggInterfControlParam*** | ***AggregatedInterferenceControlParameters*** | Shall be set to indicate the aggregated interference parameters as specified in following table, if available |

The following table shows ***AggregatedInterferenceControlParameters*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***referencePointID*** | ***INTEGER*** | Reference point ID to be protected in controlling aggregated interference from the other WSO(s) |
| ***installationParameters*** | ***InstallationParameters*** | Installation parameters of reference point |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |
| ***protectionRatio*** | ***REAL*** | Protection ratio of the reception to be protected at the reference point for the frequency if available |

The following table shows ***listOfSuppFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***frequencyRange*** | ***FrequenyRange*** | Shall be set to indicate the frequency range in which the WSO is capable of operating. |
| ***extraChannelizationIsSupported*** | ***BOOLEAN*** | Shall be set to indicate if sub-channelization or channel aggregation, supported or not |
| ***extraChannelizationDescription*** | ***ExtraChannelizationDescription*** | If present, this parameter shall be set to indicate the extra channel configuration description |

The following table shows ***listOfOperatingFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***frequencyRange*** | ***FrequenyRange*** | Shall be set to indicate the frequency range in which the WSO currently operates.  |
| ***txPower*** | ***REAL*** | Shall be set to indicate transmission power using at the frequency indicated by the above *frequencyRange.* |
| ***resolutionBandwidth*** | ***REAL*** | Resolution bandwidth if available |
| ***occupancy*** | ***REAL*** | Optionally present. If present, this parameter shall be set to indicate occupancy of the WSO frequency range. |

The following table shows ***requiredResource*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***requiredBandwidth*** | ***REAL*** | Shall be set to indicate bandwidth requested for the WSO.  |

Also, the CE shall send the ***CxMediaRegistrationConfirm*** primitive to the WSO/RLSS after it has received the ***RegistrationResponse*** message from the CM.

The following table shows ***MobilityInformation*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***maxSpeed*** | ***REAL*** | If present, this parameter shall be set to indicate the maximum speed value of the WSO (in km/h) |
| ***speedInformation*** | ***SpeedInformation*** | If present, this parameter shall be set to indicate detailed information on the WSO speed and direction. |
| ***routeInformation*** | ***RouteInformation*** | If present, this parameter shall be set to indicate the WSO planned route and time.  |

The following table shows ***CxMediaRegistrationConfirm*** primitive.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cxMediaStatus*** | ***CxMediaStatus*** | **cxMediaStatus** |

* + - 1. **WSO registration update**

After a CE has received a ***CxMediaRegistrationIndication*** primitive from the WSO/RLSS it serves, the CE shall perform the WSO registration update procedure described in 5.2.2.2. The CE shall generate and send the ***CERegistrationRequest*** message to the CM to which it is subscribed.

The following table shows ***CxMessage*** fields in ***CERegistrationRequest*** message when requesting registration update.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***ceRegistrationRequest*** |

The following table shows ***CERegistrationRequest*** payload element for one WSO when requesting registration update.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***operationCode*** | ***OperationCode*** | Shall be set to indicate registration update as “modify” or “remove”. |
| ***wsoID*** | ***OCTET STRING*** | WSO ID |
| ***wsoDescriptor*** | ***WSODescriptor*** |  |
|  |  |  |
| ***installationParameters*** | ***InstallationParameters*** | As specified in 6.4.3.5 if any update |
| ***listOfAvailableFrequencies*** | ***ListOfAvailableFrequencies*** | As specified in 6.4.3.5 if any update  |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | As specified in 6.4.3.5 if any update |
|  |  |  |
| ***requiredResource*** | ***RequiredResource*** | As specified in 6.4.3.5 if any update |
| ***mobilityInformation*** | ***MobilityInformation*** | As specified in 6.4.3.5 if any update. |

Also, the CE shall send the ***CxMediaRegistrationConfirm*** primitive to the WSO/RLSS after it has received the ***RegistrationResponse*** from the CM.

The following table shows ***CxMediaRegistrationConfirm*** primitive.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***cxMediaStatus*** | ***CxMediaStatus*** | **cxMediaStatus** |

* + - 1. **WSO reconfiguration**

After a CE has received a ***ReconfigurationRequest*** message from the CM to which it is subscribed, the CE shall perform the WSO reconfiguration procedure described in 5.2.10.1. The CE shall generate and send the ***CxMediaReconfigurationRequest*** primitive to the WSO/RLSS it serves.

The following table shows ***CxMediaReconfigurationRequest*** primitive.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***wsoID*** | ***OCTET STRING*** | WSO ID. |
| ***listOfOperatingFrequencies*** | ***ListOfOperatingFrequencies*** | Shall be set to indicate the operating frequencies to be reconfigured. |
|  |  |  |
|  |  |  |
| ***newNetworkTechnology*** | ***NetworkTechnology*** | Optionally present. If present, this parameter shall be set to indicate its WSO network technology type(s) to be reconfigured. |

Also, the CE shall send the ***ReconfigurationResponse*** message to the CM after it has received the ***CxMediaReconfigurationResponse*** primitive from the WSO/RLSS.

The following table shows ***CxMessage*** fields in ***ReconfigurationResponse*** message.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***header*** | ***CxHeader*** | ***requestID*** |
| ***payload*** | ***CxPayload*** | ***reconfigurationResponse*** |

Table below shows ***ReconfigurationResponse*** payload elements for one WSO.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***wsoID*** | ***OCTET STRING*** | ***wsoID*** |
| ***status*** | ***Status*** | **status** |

**6.4.3.8 Providing coexistence report**

After a CE has received a ***CoexistenceReportResonse*** message from the CM to which it is subscribed, the CE shall perform the providing coexistence report procedure described in 5.2.3.6. The CE shall generate and send the ***CxMediaCoexistenceReportResponse*** primitive to the WSO/RLSS it serves.

The following table shows ***CxMedia*** fields in ***CxMediaCoexistenceReportResponse*** primitive.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***networkID*** | ***OCTET STRING*** | Network ID |
| ***listOfRecommendedOperatingFrequencies*** | ***ListOfRecommendedOperatingFrequencies*** | As specified in following table |

The following table shows ***listOfRecommendedOperationFrequencies*** parameter element.

|  |  |  |
| --- | --- | --- |
| *Parameter* | *Data type* | *Value* |
| ***frequencyRange*** | ***FrequencyRange*** | Shall be set to indicate the recommended operation frequency range. |
| ***txPowerLimit*** | ***REAL*** | Shall be set to indicate the power limit in the frequency range. |
| ***availableStartTime*** | ***GeneralizedTime*** | Shall be set to indicate start time of the recommended operation frequency range if applicable. |
| ***availableStopTime*** | ***GeneralizedTime*** | Shall be set to indicate stop time of the operation recommended frequency range if applicable. |