



DRAFT GUIDELINES

ACCESS AND INTERCONNECTION

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UTILITIES REGULATION & COMPETITION AUTHORITY

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1. INTRODUCTION

These Guidelines set out the Utilities Regulation and Competition Authority's (URCA) expectations with respect to Access and Interconnection between SMP¹ licensees and other licensed operators of electronic communications networks and/or services. If none of the parties has SMP, they may agree to interconnect on any mutually agreeable terms consistent with their obligations under the Communications Act, 2009, their respective licences and these Guidelines.

These Guidelines have been designed to facilitate the timely preparation of Reference Access and Interconnection Offers (RAIOs) by SMP licensees in The Bahamas. RAIOs should be reasonable and should provide for progressive improvement as new information becomes available and additional regulatory measures are put in place.

These Guidelines are applicable to licensees presumed to have SMP or have been determined by URCA to have SMP, in one or more relevant markets.

For the purposes of these Guidelines:

"Access" means the making available of facilities and/or services, to another undertaking, under defined conditions, on either an exclusive or non-exclusive basis, for the purpose of providing electronic communications services.

"Access and Interconnection Agreement (AIA)" means bilateral agreement between two licensees for the provision of Access and/or Interconnection services.

"Interconnection" means physical or logical linking of networks to allow the users of one network to communicate with users of another network or to access carriage services provided by another licensee.

"Reference Access and Interconnection Offer (RAIO)" means a standard offer document in the form of a contract, setting out the access and interconnection services and matters relating to the price and terms and conditions under which the SMP licensee will provide such services upon request to another licensed operator.

Unless otherwise specified, terms used in these Guidelines shall have the meanings assigned to them under the Communications Act, 2009 and relevant licences.

¹ Significant Market Power

2. THE LEGISLATIVE ENVIRONMENT

2.1 The legal framework for access and interconnection comprises:

- The Communications Act, 2009 (the Comms Act); and
- Relevant Licence Conditions.

2.2 Principles for access and interconnection are contained in both the Comms Act and Individual Operating Licences. S. 39 of the Comms Act requires that URCA conducts market reviews to determine whether a licensee has SMP in one or more markets. Under s. 40(1), URCA may impose specific conditions on SMP licensees including obligations relating to:

- *cost recovery and price controls, including obligations for cost orientation of prices and obligations concerning cost accounting systems [s. 40(1)(a)];*
- *the publication of a reference offer or offers ensuring equivalence of access and/or interconnection to any of those services and/or facilities in which the licensee has SMP at tariffs based on the licensee's costs [s. 40(1)(b)];*
- *the submission of regulatory accounts or financial statements separating out the key business activities of the licensee [s. 40(1)(c)];*
- *sharing of infrastructure, facilities and systems used for the provision of electronic communications services [s. 40(1)(e)]; and*
- *such other obligations as URCA may consider necessary in pursuance of the electronic communications policy objectives and the sector policy [s.40(1)(j)].*

2.3 In addition, an SMP licensee shall:

- *not unduly discriminate against particular persons or a particular description of persons in relation to electronic communications services offered by them [s. 40(4)(a)];*
- *provide technical specifications, or other relevant information about any interconnection, essential facilities or other mandated wholesale electronic communications services on a reasonable and timely basis, when the information is required by another licensee to provide its licensable services and when the information is not readily available from other sources [s. 40(4)(b)]; and*
- *not adopt technical specifications for a network that prevents interconnection or interoperability with a network of a competitor [s. 40(4)(c)].*

Role of URCA in Electronic Communications

2.4 The Comms Act sets out the functions and powers of URCA in regulating the electronic communications sector. Broadly, URCA's key functions with respect to electronic communications include:

- *to further the interests of consumers by promoting competition in the provision of electronic communications [s. 4(a)];*
- *to encourage, promote and enforce sustainable competition [s. 4(a)(iii)]; and*
- *to further the interests of persons in The Bahamas in relation to the electronic communications sector [s. 4(b)].*

2.5 For the purposes of regulating electronic communications, the Comms Act empowers URCA to issue different types of regulatory or other measures, including:

- determinations and adjudications [s. 8(1)(a) and (s. 8(1)(b));
- conditions and penalties by order [s. 8(1)(c)]; and
- regulations [s.8(1)(d)].

Role of URCA in Access and Interconnection

2.6 The role of URCA includes:

- Reviewing and approving RAIOS to ensure that they are consistent with the Comms Act, relevant licence conditions and these Guidelines.
- Establishing one or more dispute resolution schemes for disputes between licensees or approve a scheme or schemes proposed by licensees under s. 15(4) of the Act.
- Resolving inter-operator disputes.
- Determining that a licensee has SMP in a particular market.
- Specifying cost accounting methods to be used by SMP licensees to derive charges for services and facilities offered for access and interconnection.
- Enforcing the competition provisions of the Comms Act.

3. SCOPE OF THE ACCESS AND INTERCONNECTION GUIDELINES

3.1 These Guidelines are designed to assist SMP licensees in the Bahamas in developing RAIOS that meet URCA's requirements and thus support the objectives as specified in s. 4 of the Comms Act, including:

- to promote investment and innovation in electronic communications networks and services; and
- to encourage, promote and enforce sustainable competition.

Further, these Guidelines are designed to assist licensees seeking to purchase interconnection and access services and facilities from an SMP licensee in The Bahamas in understanding the principles of access and interconnection applied by URCA and the

scope of services and facilities and associated processes and documentation it should expect from an SMP licensee.

In particular, these Guidelines are designed to ensure that:

- Access and Interconnection is established and provided in accordance with standard terms and conditions as set out in the relevant RAIO and approved by URCA.
- Operators presumed to have SMP² or have been determined by URCA to have SMP³ do not seek to impede competition through commercial, technical, operational or other aspects of Access and Interconnection, or by setting charges in excess of efficiently incurred costs.
- The Access and Interconnection Agreement:
 - does not become a tool through which two or more operators can collectively remove the benefit of competition from customers; and
 - is not otherwise contrary to the Comms Act, relevant licence conditions and these Guidelines.

3.2 These Guidelines apply solely to licensed operators of public electronic communications networks and services. For the elimination of doubt the Guidelines are not applicable to operators of private electronic communications systems, or to end users.

3.3 These Guidelines are designed to facilitate access and interconnection for licensed operators who need services and facilities from SMP licensees.

4. ACCESS AND INTERCONNECTION PRINCIPLES

4.1 URCA expects any RAIO to respect the following principles.

The overarching principle is that:

The terms, conditions and charges for services and facilities offered for access and interconnection should support the development of sustainable competition to the benefit of persons in The Bahamas and the national economy.

4.2 Further, any RAIO should be consistent with the following principles:

² See Schedule 4 of the Comms Act.

³ Section 116(4) of the Comms Act.

- **Any-to-any connectivity:** The RAIO shall offer access and interconnection services that enable any-to-any connectivity between customers on an SMP operator's network and customers on other networks.
- **Rights of access and interconnection for electronic communications systems:** (Provided that this is consistent with the relevant licence conditions) all licensed operators of electronic communications systems and services (including SMP operators) shall have the right to either physically or logically connect their systems to all other electronic communications systems. For the elimination of doubt, purely private electronic communications systems will not have the right to access and interconnection.
- **Obligation to interconnect:** (Provided that this is consistent with the relevant licence conditions) all operators of electronic communications systems (including SMP operators) shall be obliged to respond to requests for interconnection.
- **Good faith negotiation:** All operators of electronic communications systems must respond to requests for access and interconnection in good faith.
- **Timeliness:** All providers of electronic communications networks and services (including SMP operators) must respond to requests for access and interconnection, and requests for amendments to existing access and interconnection agreements, in a timely fashion. The processes contained in the RAIOs should specify timeframes that reflect this principle.
- **Technical standards:** Technical requirements for access and interconnection should be sufficient to protect the integrity of the system, and ensure interoperability of interconnected systems, without becoming a barrier to competition.
- **Non-discrimination:** The terms, conditions and charges for access and interconnection must be no less favourable than those the SMP operator offers its own business unit, its Affiliates (if any), or any other operator.
- **Points of Interconnection:** In general, interconnection should be available at any technically feasible point, unless interconnection at that point:
 - is not feasible given the existing network configuration; or
 - would compromise the integrity of an electronic communications system (whether the SMP operator's, interconnection seeker's, or a third party's system); or

- would compromise the interoperability of any electronic communications system (whether the SMP operator's, interconnection seeker's, or a third party's system).
- **Reasonably unbundled elements:** SMP operators should not be allowed to bundle access and interconnection services together if the purchaser only requires some of the services. Where an operator has SMP, it should unbundle distinct services and facilities, and corresponding charges, sufficiently so that an operator seeking access and/or interconnection need only pay for the specific elements of the network for which access and or interconnection is required.
- **Transparency:** SMP operators should ensure that their procedures for access and/or interconnection, and terms, conditions and charges for access and/or interconnection are transparent.
- **Cost-oriented charges:** Access and interconnection charges offered by an SMP operator should be cost-oriented, i.e. charges should allow the SMP operator to recover the efficiently incurred costs, including a reasonable rate of return on capital employed. For the avoidance of doubt, prices set on a retail minus basis are also considered to be cost-oriented.

5. CONTENT OF REFERENCE ACCESS AND INTERCONNECTION OFFERS (RAIOs)

- 5.1 The RAIO should take the form of a draft contract which:
- creates maximum transparency;
 - reduces time required to establish individual agreements; and
 - reduces uncertainty for new operators and risk for investors.
- 5.2 The RAIO should be provided in a modular format with standard components to be included into individual agreements as required. The RAIO should have three basic sections as follows:
- the main legal body of the agreement;
 - legally binding schedules; and
 - annexes.
- 5.3 The main body of the RAIO is usually standard and would only be changed to reflect the names of the parties entering the agreement. The main legal provisions should not vary between different agreements unless there is a specific reason for this.

The main body constitutes the main legal agreement and typically should include the following components clauses:

- Recitals
- Definitions and Applicability
- Commencement and Duration
- Scope of access and interconnection
- New Services Provisions
- Forecasting, ordering and Provisioning
- Operations and Maintenance
- Systems Changes
- Services
- Charges, Variation of Charges
- Billing and Payment
- Infrastructure Sharing, CLI, Numbering, Provision of Information
- Service Performance and Standards
- Safety, Fraud Prevention, Confidentiality
- Use of Directory information, Intellectual Property Rights
- Review and Amendments, Breach Suspension and termination
 - Force Majeure, Liability, General Legal Clauses
 - Specify one or more dispute resolution schemes.

5.4 Legally binding schedules should include such schedules as:

- Definitions
- Billing and payments
- Service descriptions
- Service Level Agreements (SLAs)

- Schedule of Services Taken
 - Price lists
- 5.5 Non-legally binding annexes should include:
- Technical specifications
 - Operations & Maintenance requirements
 - Processes and procedures.

Some of the major provisions of the RAIO are dealt with in separate Sections below.

RAIO Service Schedules

- 5.6 The service schedules should provide a description of the RAIO services. Each service offered should form an individual sub-schedule.

Operators requiring access and/or interconnection should be able to “pick and choose” which of the services they want to purchase to support the products they wish to offer to their customers. The services taken by the operator should then be listed in the “Schedule of Services Taken”.

- 5.7 Each of the service descriptions should be comprehensive but concise and should explain:
- What each service does
 - How each service is provided
 - What the undertaking needs to do to access the service
 - How the undertaking may and may not use the service.

An operator should be able to read a Service Sub-schedule and understand whether it requires the service and whether it is able to provide the technical and operational interfaces necessary to use and support the service. Each service description should include such points as:

- Obligation to supply;
- Limitation of service scope;
- Technical interfaces;

- Non-discrimination;
- Fault management;
- Service related specific restriction of routing or specific routing principles;
 - Where a product requires the use of specific quality of service parameters then the sub-schedule should describe the parameters and how they will be applied;
 - The charging principles and parameters for each service must be included in the sub-schedule; and
 - Each Sub-schedule must include references to how the two undertakings will bill each other as appropriate for the services provided and received; often this is achieved through a reference to the Billing and Payments Schedule.

Process for inclusion of New Services in RAIO

5.8 The development of new services is recognised as one of the most complex areas of a RAIO. This is often due to:

- The operator requesting the services may not understand the SMP operator’s network well enough to specify the request for “New Services” correctly;
- The operator requesting the service may need the new RAIO service to support an innovative service, hence commercial confidentiality is an issue; and
- The SMP operator has little or no interest in supporting the process.

5.9 URCA expects that the RAIO should include a section that should establish the general principles for how new services can be requested, investigated, developed and launched under the RAIO framework. This section should either contain specific timescales and processes for the requesting of a development of new RAIO services or it should cross-reference another source where this information is set out.

The New Services development framework should be legally binding and at a minimum the process should contain the following:

- Timescales for reviewing a request for a new service;
- Timescales for negotiation of a new service;
- Timescales for development of a new service;
- Timescales for total new service process;
- Pro forma documents for:
 - Request for new services;
 - Service specification; and
 - Other critical correspondence.

Service Level Agreements

5.10 The RAIO shall contain Service Level Agreements (SLAs) for the forecasting, ordering, installation, maintenance, repair and billing, and quality of service parameters for the RAIO services, including penalties for failing to meet the SLAs. The following list should comprise the minimum SLA provisions:

- A definition of service quality criteria for all services and specification of the quality of service levels both parties are required to meet, including:
 - Technical specifications and standards; and
 - Technical service level commitments.
- Procedures for the forecasting capacity and volume of traffic between the parties. Penalties should apply for late submission of forecasts and variance between forecasts and actual capacity requirements/volumes.
- Penalty payments relating to delays in service provisioning and/or testing.
- Penalty payments relating to fault repair times.

Billing and Payments Schedule

5.11 The RAIO should set out billing requirements and processes, including:

- Procedures for calculating and invoicing charges. (For example, are invoices calculated from call detail records? If so, from the records of which party?) The RAIO should also include an indication of which party is responsible for calculating and collecting the charges in each instance.
- Responsibility for customer billing, collection and bad debts for each service or facility.
- Data collection and invoice processing responsibilities and steps, and the details of each party's billing representatives.
- Billing principles and timeframes for issuing invoices, payment, and calculating interest on overdue amounts.
- Processes for billing validation, rectifying billing errors and resolving invoice disputes.
- Requirements for retention of billing information.

Charges for Services and Facilities

5.12 Charges for access and interconnection services and facilities shall be cost oriented and derived using the Accounting Separation and Cost Accounting guidelines specified by URCA.

- 5.13 Where URCA requires that charges be based on a 'retail minus' principle, the level of the discount against the SMP licensee's retail price must reflect the SMP licensee's avoidable costs.
- 5.14 Enabling services such as joining circuits and co-location should be provided on a cost-oriented basis. With respect to joining circuits, the RAIO should reflect the following principles:
- The RAIO should allow for the installation of new equipment if the cost would be lower than leasing existing equipment;
 - If the access and interconnection seeker can install new equipment at a lower cost than the SMP licensee, then the SMP licensee must consider this option, provided that it complies with the Technical Standards and Specifications for access and interconnection; and
 - Charges for joining services should be shared equally between the parties. In addition to providing the joining service charges in a tariff schedule, the RAIO should explain how this cost-sharing will be implemented.
- 5.15 It remains the responsibility and duty of the SMP licensee to demonstrate to URCA that access and interconnection charges are based on the Accounting Separation and Cost Accounting, and charging principles specified by URCA.
- 5.16 The RAIO must contain a complete list of charges for each facility and service covered by the RAIO. These should be specified in a tariff schedule to the RAIO. The charging schedule should include the following information, where relevant and appropriate:
- All elements of the charges for non-call services such as co-location, backhaul, access to bitstream and distribution of content should be clearly identified.
 - The rules applied for charging for non-call services could include:
 - For co-location: type of co-location space provided (e.g. dedicated co-location space, co-mingling) and the volume of the actual space provided (e.g. by square foot of rack footprint).
 - For backhaul: capacity of backhaul service provided and distance.
 - For access to bitstream: charges per port, charges for upgrades and downgrades of ports, contention ratios.
 - For distribution of content: carriage fees, channels/packages provided, interactive/non-interactive content, access to Electronic Programme Guide (EPG), changes to channel mix.
 - All elements for enabling services such as air-conditioning, power, security charges.

- All elements of the charges for call services should be clearly identified. (For example, many carriage service charges may include an interconnect charge, a call duration charge and/or a call setup charge. For some services, other charges may also be incurred. These should all be specified in the tariff schedule.)
- The rules applied to charging for call services include:
 - the point at which charges are applied to each call (for example, whether charges are applied to answered calls only, or whether call duration is also measured for unanswered calls);
 - whether there are differences in tariffs between peak, off-peak and weekend periods. If so, then these periods should be defined in the RAIO. If there are differences in tariffs between these periods, these should also be indicated in the tariff schedule; and
 - whether different tariffs apply to local, national, and international traffic for carriage services.

5.17 The RAIO must include processes for dealing with circumstances where:

- additional costs are incurred outside those specified in the tariff schedule, or
- the SMP licensee wishes to amend existing charges, or impose additional charges.

Technical Standards and Specifications

5.18 RAIOs should reflect the following principles for services and facilities:

- Each party should manage capacity/congestion on its system to avoid disruption to the other party's system, and to minimize service failures and congestion as far as possible within their own system, to avoid affecting the ability of the other party to offer services.
- Each party should advise the other party of faults or planned maintenance, or of any planned developments within its system, that may impact on the service provided
- Each party shall supply the other party with reasonable forecasts in accordance with the RAIO. Parties should provide the forecasts in good faith and endeavour to ensure that all forecasts are accurate.

5.19 The RAIO should describe the Technical Standards and Specifications applicable to both parties for the services and facilities offered. These standards and specifications should be incorporated as a schedule to the RAIO and should be consistent with the principle that access and interconnection should not be unnecessarily constrained by technical obstacles or limitations that have no justifiable or objective basis.

5.20 The Technical Standards and Specifications should include the following information on the SMP licensee's network and infrastructure (as applicable to various services):

- Functional characteristics of the system or equipment;
- Electrical characteristics;
- Configuration;
- Signalling;
- Traffic handling principles; and
- A schedule of POI sites, by type.

5.21 The RAIO should include detailed procedures for:

- requesting each type of POI;
- installing and maintaining equipment at POI sites, including testing and acceptance;
- responsibility for planning, providing, operating and maintaining equipment and facilities at a POI; and
- procedures for acceptance testing, operations and maintenance of equipment at a POI.

5.22 The SMP licensee may decide to add new POIs, move POIs or remove POIs. The Technical Standards and Specifications should stipulate the procedures for adding, moving or removing POIs, including:

- The criteria and procedure for deciding where a new POI may be added or where POIs can be moved or removed;
- The procedure by which another licensee may request a new POI;
- The procedure for notifying access and interconnection seekers of changes to POIs; and
- The procedure for implementing changes to POIs, including testing procedures and supplier responsibilities, once the change to a POI has been agreed by the parties.

Information Exchange

5.23 The RAIO should also specify the requirements for information exchange between the parties for the purposes of access and interconnection. This includes:

- *Subscriber and billing information:* The RAIO should indicate the format in which subscriber and billing information is to be provided, for billing requirements.
- *Routing information requirements:* The RAIO should set out requirements for exchange of routing information, including the format for such information.
- *Caller Line Identification (CLI) information:* The RAIO should specify the conditions under which CLI is to be shared, as well as requirements and safeguards with which interconnecting parties are required to comply.

- *Numbering Schemes:* Parties will need to ensure that sufficient and correct numbering information is passed from one network to another for correct delivery of interconnected calls. The numbering information will need to comply with the national and international formats specified by URCA, and should comply with the national numbering plan and any Instructions, or Determinations on number usage, allocation and assignment issued by URCA.
- *Performance reporting and interconnect resolution logs:* The RAIO should include requirements, formats and procedures for performance monitoring and reporting.
- *Bitstream Access:* The RAIO should specify the requirements for the allocation and reporting of ports, including port types (speed and contention ratios) and how this information will be provided for billing and the management of customer information.
- *Co-location:* RAIO should specify how information exchange relating to authorised personnel having access to co-location sites should be communicated
- *Content:* The RAIO should specify how information relating to content provision including the management of changes to content (premium/non-premium), changes to package mix, use of interactive services, and Electronic Programme Guide (EPG) information will be communicated between both parties.

5.24 The RAIO must specify the procedures the SMP licensee proposes to implement to ensure that it cannot misuse commercially sensitive information. These procedures should clearly set out:

- The types of information that are considered commercially sensitive for the purpose of the procedures.
- The permitted purposes for which the SMP Operator may use commercially sensitive information.
- Limitations on the disclosure of such information. In particular commercially sensitive information should not be transmitted or disclosed to the SMP Operator's retail division or an affiliate, or to any employees involved with the SMP Operator's retail services or to an unrelated entity or person.
- Procedures for storing and transmitting the information, to ensure that commercially sensitive information is only used for permitted purposes.

Processes and Procedures

5.25 The RAIO should outline how applicants are to request services and facilities for access and interconnection, and must provide guidance on the required format and content for these applications. Provisions should include the following:

- A description of the letter of application and information to be supplied.

- Process for assessing applications for access and interconnection, including key timeframes; and description of how applicants will be notified whether their application is successful.
 - *Negotiations based on the RAIO:* An access and interconnection seeker may wish to negotiate modifications to the RAIO, so as to tailor the resulting agreement to its particular needs. For example, an interconnection seeker may wish to interconnect at a Point of Interconnection not offered in the RAIO. The RAIO should allow for this possibility and should indicate the process for commencing such negotiations.
- 5.26 The RAIO should describe how parties can make changes to the agreement once it is in place. Changes may include:
- Provision of additional circuits and carriage;
 - Provision of additional POIs;
 - Changes by either party to their system, equipment or procedures in ways which affect the agreement;
 - Inclusion of additional services (for example, to reflect changes to the RAIO, market liberalization, or technological/market changes); and
 - Changes to agreed charges and/or pricing approaches for services and facilities.
- 5.27 For each of these changes, the RAIO should describe:
- The process and format for notifying the other party about the proposed change.
 - The process and format for the other party to accept the proposed change, including applicable timeframes and conditions of acceptance.
 - Conditions under which the proposed change may be refused.
 - A description of each party's responsibilities for service testing, implementation and operation once the change has been agreed.
 - An indication of procedures and penalties associated with early termination of a new service or facility.
- 5.28 Upon acceptance of the proposed change by the other party, the new services or other changes to the agreement will be deemed to be in effect, and the relevant schedules of the agreement must be amended by the parties.

6. PUBLICATIONS OF REFERENCE OFFERS

- 6.1 SMP licensees required to provide a RAIO shall publish such offer on its web site whether the RAIO has been approved by URCA or not. Further, publication of an approved RAIO must be no later than 5 business days from the date of approval by URCA.

7. REVIEW AND AMENDMENTS OF REFERENCE OFFERS

- 7.1 URCA will review the RAIO, or any proposed amendments to an existing RAIO, to ensure consistency with the Comms Act, relevant licence conditions and these Guidelines.
- 7.2 If URCA finds a RAIO to be inconsistent with one or more of the documents mentioned in 7.1 above, then it will direct the SMP licensee to modify the RAIO accordingly.

8. REVISION OF AIAs

- 8.1 The RAIO is expected to evolve over time as the Bahamian electronic communications sector evolves. All AIAs should be automatically amended to reflect the current RAIO to ensure consistency with regulatory or other measures issued by URCA. Changes to the RAIO may reflect a number of inputs, including:
- Further liberalization of the sector, and the introduction of competition into new services. For example, in the future the RAIO may need to provide for access and interconnection for carrier pre-selection, number portability, etc.
 - Availability of reliable and relevant costing data.
 - Court decisions that necessitate amendments to a RAIO.
 - Utilities Appeals Tribunal decisions that necessitate amendments to a RAIO.
- 8.2 Where URCA has instructed an SMP licensee to modify the RAIO, if the changes are relevant to the terms of an existing agreement, the modification will be automatically incorporated without the need for negotiation between the parties.

9. FILING OF AGREEMENTS

- 9.1 All access and interconnection agreements must be submitted to URCA at least ten (10) business days before they come into effect.

9.2 If an existing agreement is modified in a material way, the revised agreement should be submitted to URCA, with the proposed modifications in such a form as to show each modification as it will read if adopted, with any changes in language either underlined or in bold type, if new, and lined out, if deleted.

10. DISPUTE RESOLUTION

10.1 URCA may determine:

- Pre-agreement disputes (i.e. disputes that may arise between parties in the course of negotiations between licensees); and
- Post-agreement disputes (i.e. disputes relating to the terms and conditions of an existing contract).

10.2 Post-agreement disputes may be referred to URCA for resolution unless specifically excluded by the terms of the agreement.

10.3 Disputes referred to URCA may relate to the agreement (or proposed agreement) in its entirety, or to a particular provision or provisions of the agreement. For example, an interconnection dispute may relate to the technical specifications for interconnection at a particular POI, or to charges for specific services such as international and national long distance calls.

10.4 Disputes referred to URCA will be subject to any dispute resolution procedures already in place or new procedures issued by URCA.

10.5 The parties shall not refer any dispute to URCA unless they have first made good faith and reasonable efforts to negotiate the matter:

- over a period of not less than 4 calendar months following the onset of any complaint or dispute between them; or,
- having referred the matter to alternative dispute resolution, were unable to resolve the matter through that process.

Annex 1

Description of Products from Consultation Document

Call termination	Completion of calls that originate on the interconnection seeker's network to end-users located on the interconnection provider's network. Examples of termination services include national long distance termination or local call termination services.
Call origination	<p>Transmission of calls from an end-user located on the interconnection provider's network to a Point of Interconnection with the interconnection seeker's network.</p> <p>Origination includes transmission of local or national long distance calls from an end-user on the interconnection provider's network to an end-user on the interconnection seeker's network. This can also be viewed as the provision of termination services by the interconnection seeker to the interconnection provider. Interconnection seekers wishing to terminate calls from an interconnection provider's network in order to provide full two way service to their end-users should be able to do so.</p>
Call Transit	Transmission of calls between Operator A's network and Operator B's network, where these two networks are not physically interconnected.
Incoming International Calls	Transmission of incoming international calls from the interconnection seeker's system to an end-user on the interconnection provider's fixed or mobile network. (Where incoming international calls are directed to an end-user on the network of an entrant telecommunications operator, the incumbent operator receives a settlement rate payment from the foreign operator for the incoming call, but must purchase termination services from the entrant in order to complete the call. Thus in this situation the interconnection provider is the entrant operator and the interconnection seeker is the incumbent.)
Outgoing international calls	Conveyance of calls from a Point of Interconnection with the interconnection seeker's network via the interconnection provider's network to an end-user in a country outside The Bahamas.
Emergency call termination	Termination of emergency calls from an end-user on the

	interconnection seeker's network to the emergency service organisations located on the interconnection provider's network. Emergency service organisations include (but are not limited to) the police, ambulance and fire services, and the maritime search and rescue services.
Mobile termination	Termination of calls originating on the interconnection seeker's network to end-users located on the interconnection provider's mobile network.
Mobile origination	Transmission of calls from an end-user located on the interconnection provider's mobile network to a Point of Interconnection with the interconnection seeker's network.

Calls to Directory Enquiries	Termination of calls from an end-user on the interconnection seeker's network to the directory enquiry service located on the interconnection provider's network.
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Call Origination – Carrier Pre-Selection	<p>A call originated by a subscriber directly connected to an SMP operator's network, utilising a carrier selection routing prefix assigned to the operator, for hand over to the operator via a Point of Interconnection.</p> <p>Carrier Pre-Selection is implemented to enable subscribers to pre-determine their operator of certain types of call. Any calls of this type are automatically redirected to the designated operator's exchange</p> <p>An SMP operator shall convey and hand over to the operator a call initiated on its system by a subscriber using a Carrier Selection Routing Prefix.</p>
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Call Origination – Carrier Selection	<p>A call originated by a subscriber directly connected to an SMP operator's network, utilising a carrier selection routing prefix assigned to the operator, for hand over to the operator via a Point of Interconnection.</p> <p>Carrier Selection is implemented to enable subscribers to choose their operator on a call by call basis. A Carrier Identification Code (CIC) is dialled before the number. This</p>
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	code ensures the call is directed via the relevant operator
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Call Origination – Carrier Pre-Selection with Call-by-call override	<p>A call originated by a subscriber directly connected to an SMP operator’s network, utilising a carrier selection routing prefix assigned to the operator, for hand over to the operator via a Point of Interconnection.</p> <p>Carrier Pre-Selection with call-by-call override is implemented to enable subscribers to designate certain operators for certain types of call, which are automatically redirected, but can also use Carrier Identification Codes to override their pre-determined automatic selection.</p>
Leased circuits	<p>An interconnection provider may lease capacity to an interconnection seeker to enable provision of dedicated connectivity:</p> <p>Between two parts of the interconnection seeker’s network (for example, to link networks on two separate islands); or</p> <p>From the interconnection seeker’s network to a customer’s premises.</p>
Joining circuits	<p>An interconnection provider may lease capacity to an interconnection seeker to enable provision of dedicated connectivity from the interconnection seeker’s network boundary to a Point of Interconnection with the interconnection provider’s network. Joining circuits may be:</p> <p>Point-to-point (for example, a dedicated point-to-point digital transmission service where the A-end is a network interface point or Point of Interconnection on the interconnection seeker’s network, and the B-end is a Point of Interconnection on the interconnection provider’s network); or</p> <p>Multi-point (for example, a wireless transmission service with transmitters/receivers in the interconnection provider’s exchange and at several Points of Interconnection with the interconnection seeker’s network).</p>
Points of Interconnection (POIs)	<p>A Point of Interconnection (POI) is the boundary between the interconnected networks, located somewhere on the interconnection provider’s network. A POI may be located at</p>

	the premises of the interconnection provider (co-location), within the premises of the interconnection seeker (customer sited interconnect), or at a point in between the interconnection provider's and interconnection seeker's respective premises (in-span interconnect).
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Broadband Resale service	Provision of wholesale broadband resale services.
Broadband Bitstream Access	Provision of wholesale broadband bitstream access services.

Unbundled Access to the Local Loop – Full local loop unbundling	Full local loop unbundled access to the local loop of the network operator deemed to have SMP in the relevant market.
Unbundled Access to the Local Loop – Sub-loop unbundling	Sub-loop unbundled access to the local loop of the network operator deemed to have SMP in the relevant market.
Unbundled Access to the Local Loop – Shared Access	Shared Access to the local loop of the network operator deemed to have SMP in the relevant market.

Cable TV network access at a local Ethernet layer 3 router/switch	Local Ethernet layer 3 router/switch access to the cable TV network of the network operator deemed to have SMP in the relevant market.
Cable TV network access at an Ethernet layer 3 router/switch higher in the network hierarchy	Ethernet layer 3 router/switch access to the cable TV network of the network operator deemed to have SMP in the relevant market.

Backhaul	SMP operator provides another operator with capacity between a point in the other operator's network to a point either on the other operator's network or to a point on the SMP operator's or third party's network.
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Facility sharing / Co-location	<p>Sharing of the interconnection provider's facilities to facilitate interconnection; and, in some cases, network expansion by the interconnection seeker to facilitate interconnection. Facility sharing includes:</p> <p>Co-location in the interconnection provider's exchange, either:</p> <p>Physical co-location, where the interconnection seeker pays a fee to the interconnection provider for access to its building. For example, the interconnection seeker may rent a secure space in the interconnection provider's exchange building, for installation of its equipment; or</p> <p>Virtual co-location, where the interconnection seeker rents or leases equipment from the interconnection provider, and uses this equipment to gain access to the incumbent's switching and transmission facilities without needing to physically enter the interconnection provider's building.</p> <p>Sharing of masts or towers for wireless telecommunications equipment.</p> <p>Sharing of ducts to facilitate the laying of cables.</p>
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Directory assistance information	<p>Provision of access to the interconnection provider's database of its end-users' numbers, to facilitate the provision of directory information services by the interconnection seeker.</p>
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Data Management Amendments	<p>Data reconfiguration of either or both operators' system(s) as is necessary for the access, routing and charging of calls on and between the operators' systems (e.g. for setting up new number groups etc.).</p>
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