### 1. Definitions

The following definitions apply, in addition to those in the General Terms and Conditions and the General Services Schedule.

"Autonomous System" means a connected group of one or more IP prefixes run by one or more network operators which have a single and clearly defined routing policy.

"Autonomous System Number" or "ASN" means a globally unique number assigned by a Regional Internet Registry. There are two types of ASNs: Public and Private. A Public ASN is used when an Autonomous System is exchanging routing information with other Autonomous Systems on the public Internet. That is, all routes originating from an Autonomous System are visible on the Internet. A Private ASN is used if an Autonomous System communicates via BGP with a single provider. As the routing policy between the Autonomous System and the provider will not be visible in the Internet, a Private ASN can be used for this purpose.

"Border Gateway Protocol" or "BGP" means a gateway protocol which routers use to exchange appropriate levels of routing information.

"Customer Domain Incident" means an incident that is not an Excluded Incident that is caused or contributed to by an act or omission outside the Service Management Boundary and includes, but is not limited to, incidents where the reason for outage is a failure caused by:

- (a) inadequate power supply, whether reported by the Customer or proactively identified by BT;
- (b) the Customer's equipment or equipment not managed by BT under the Agreement;
- (c) a supplier to the Customer (other than BT); or
- (d) the Customer attempting to use the Service for a purpose beyond the solution design or outside the scope of the Agreement.

"Domain Name" means a name registered with an Internet registration authority for use as part of the Customer's URL.

**"Domain Name Service"** or **"DNS"** means a directory system which translates numeric IP addresses into Domain Names to identify users on the Internet.

"Excluded Incident" means an incident where the reason for outage is a failure caused by:

- (a) a Customer power failure that is caused
  - (i) by an event of force majeure as set out in clause 14 of the General Terms and Conditions (but does not include persistent power failures);
  - (ii) by planned maintenance by the Customer where such maintenance was notified in advance to BT in accordance with the Agreement;
- (b) an incident that is caused by an initial commissioning or delivery issue before the Operational Service Date; or
- (c) a subcontractor of BT.

"Indicative Delivery Date" means an estimated delivery date provided to the Customer by BT after the Customer has signed the Order.

"Internet" means the global data network comprising interconnected networks (using the TCP/IP protocol suite).

"IP" means internet protocol, a network layer protocol offering a connection-less Internet network service.

"Internet Service Provider" or "ISP" means an organisation that provides services for accessing or using the internet.

"LAN" means Local Area Network comprising the Customer's internal data network.

"PoP" means Point of Presence, which is a location where the Access Line is connected to a core Network.

"Provider Independent Resource" or "PIR" means Internet resources (public IP addresses and Public AS numbers) that have been given by an RIR to a customer and or an ISP to use. "Private ASN" see Autonomous System Number.

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"Public ASN" see Autonomous System Number.

"Regional Internet Registry" or "RIR" means the five organisations that manage the allocation and registration of Internet resources (public IP addresses and public AS numbers) around the world. These organisations are as follows; African Network Information Centre (AfriNIC), American Registry for Internet Numbers (ARIN), Asia-Pacific Network Information Centre (APNIC), Latin America and Caribbean Network Information Centre (LACNIC), Réseaux IP Européens Network Coordination Centre (RIPE). "Severity 1 Incident" means an incident that has a severe impact on the Customer's Service which cannot be circumvented.

"URL" means Uniform Resource Locator, which is the address used to locate a resource on the Internet.

## 2. Service Description

BT Internet Connect Global provides robust, reliable, high performance, managed global Internet access. It is designed specifically for multinational corporations and content providers to connect Sites to the Internet, from branch offices to data centres, and to facilitate applications such as e-mail, access to the public Internet and Intranet/Extranet deployment.

BT will provide the standard service components, as described in section 2.1 below and as may be further specified in the Order, together with the additional service features as described in section 2.2 where selected by the Customer and set out in the Order (the "**Service**").

## 2.1 Service Components

### 2.1.1 Access Line

BT or its agent will arrange for the Site(s) to be connected to an Internet point of presence ("**PoP**") using the type of Access Line set out in the Order. The Access Line option(s) available at a Site may vary according to the location of the Site, but will include one or more of the following:

- SDH Access Line;
- Ethernet Access Line; or
- Customer's existing Access Line.

# 2.1.1.1 IP Address Allocation and Management

BT will manage the IP addresses that are used with the Service.

The Customer will specify in the Order whether it will use its existing IP addresses with the Service, or whether it requires IP addresses to be allocated by BT.

If BT allocates IP addresses to be used with the Service the Customer will return those IP addresses to BT when the Service is cancelled or ceased.

If the Customer elects to use its existing IP addresses with the Service, the Customer will ensure that its existing IP addresses are not allocated to any other entity by any Regional Internet Registry.

# 2.1.1.2 Static or Dynamic Routing

The Customer will specify in the Order whether communication between the Customer's network into the Internet will be static or dynamic (using BGP routing).

If the Customer specifies dynamic BGP routing with the Service, the Service will require an autonomous system number ("ASN") to be used with it. The Customer will specify whether it will use its existing Public or Private ASN, or whether it wishes BT to assign a Private ASN.

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If BT allocates a Private ASN to be used with the Service, the Customer will return this ASN to BT when the Service is cancelled or ceased.

# 2.1.1.2 Domain Name System ("DNS") Service

BT will provide a caching DNS server to hold a number of frequently used DNS entries, to enable faster resolving of IP addresses and to relieve the DNS servers of some of their work.

BT will configure its servers to enable reverse DNS resolution for Customers whose IP addresses are allocated by BT as part of the Service. Reverse DNS lookup is the process of finding a host name (e.g. www.bt.com) corresponding to an IP address on the public Internet using a Domain Name System.

## 2.1.2 Port

BT or its agent will arrange for the Access Line(s) to be connected the Internet PoP using the type of port specified in the Order. The port speeds that are available at an Internet PoP may vary.

## 2.1.3 Performance Reports

BT will make Internet Access Network Performance Reports available to the Customer via a web portal.

The Internet Access Network Performance Reports show the performance of the Network between BT-selected PoPs. The performance parameters that can be viewed by the Customer include the following:

- Core network performance (including port utilisation, round trip delay, packet drops or discards).
- Customer port performance (including port utilization, throughput, packet drop or discard, packet errors for average and peak values, inbound and outbound).

The Customer can access the online portal using the following website address: <a href="https://www.globalservices.bt.com/uk/en/my\_account">https://www.globalservices.bt.com/uk/en/my\_account</a>

BT will update the information contained in the Internet Access Network Performance Reports periodically.

### 2.2 Service Optional Features (Not all options are available at all locations)

### 2.2.2 Additional Domain Name System ("DNS") Service

If the Customer selects one of the following as a Service option, BT will host the Customer's registered domain name as primary and/or secondary as set out below:

- If the Customer orders the 'primary DNS' option as part of the Service, BT will host the Customer's registered domain name on BT's server(s) and will make a web interface available to the Customer. This web interface enables the Customer to manage its DNS records.
- If the Customer orders only the 'secondary DNS' option as part of the Service, BT will host the Customer's registered domain name on BT's server(s).
- If the Customer orders both the 'primary DNS' and 'secondary DNS' options as part of the Service, BT will host the Customer's 'primary DNS' and 'secondary DNS' server(s) on two separate systems to maximise resilience of the DNS Service.

## 2.2.3 Access Line Resilience

If the Customer selects one of the following Access Line resilience options as part of the Service, BT will provide a second Access Line to improve the availability of Internet connectivity at a Site(s). Not all options are available in all locations.

Access Option	Primary	Secondary	Comments
"Secure"	Leased Line or Ethernet	Leased Line or Ethernet	BT will provide two separate Access Lines to a Site. BT will connect the two Access Lines to the same PoP.
"Secure+"	Leased Line or Ethernet	Leased Line or Ethernet	BT will provide two separate Access Lines to a Site. BT will connect the two Access Lines to two separate PoPs.

If the Customer selects Access Line resilience as a Service option, then depending on the Customer's preferences and the configuration, routing protocol and speeds of its network, BT will configure the second Access Line for either:

- 'Failover' with this option BT provides a second Access Line as a backup to the primary Access Line. The primary and secondary Access Lines are connected to two different access Routers which are configured so that if the primary Access Line fails traffic will route via the secondary Access Line; or
- 'Load balancing' with this option BT provides two Access Lines to a Customer's Site, connecting to different access Routers in a PoP. Normally both Access Lines are in use, but if one fails, then traffic can flow over the other (subject to sufficient capacity being available on the other Access line).

On both scenarios above, the port speed for each Access Line must be equal.

# 2.2.4 BT Equipment (Managed Routers)

If the Customer selects this option as part of the Service, BT will:

- deliver and install the Managed Router(s) at the Site;
- conduct acceptance testing of the Managed Router(s) up to layer 3 of the Open Systems Interconnection (OSI) reference model and commission it into the Service;

A number of maintenance service options are available for Managed Routers. These options vary from country to country and must be selected for each Site and specified on the Order.

### 3. Service Delivery

3.1 The Customer may request a delivery date for any Site on the Order. After the Customer has signed the Order BT will provide an Indicative Delivery Date and (where applicable) BT will then conduct a Site survey.

3.2 If a Site survey is not conducted or if the Site survey does not reveal any issues, BT will confirm the final Customer Commit Date.

3.3 If the Site survey reveals issues which affect the Order (including Charges and conditions) BT may provide a new quotation. If the Customer accepts the new quotation then the existing Order will be cancelled,

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a new Order will be generated on the basis of the new quotation. If the Customer accepts such new Order, a new delivery date will be agreed which will also be the final Customer Commit Date.

3.4 If the Customer does not accept the new quotation then the existing Order will be cancelled, BT will not provide Service and the Customer agrees that BT shall not be liable in these circumstances.

3.5 For Service with Managed Routers, BT will configure the BT Equipment and the Access Lines so that traffic can be sent from one Site to another and conduct a set of standard tests. The Operational Service Date occurs on successful completion of the tests.

3.6 For Service without Managed Routers BT will confirm delivery of the Access Line, configure the Service and conduct a set of standard tests. The Operational Service Date occurs on successful completion of BT's tests.

3.7 BT provides a pair of DNS resolvers for the Customer to resolve DNS records. The Service is considered delivered even if only one of the resolvers notified to the Customer is operational.

3.8 BT can assist with traffic migration after the Operational Service Date subject to an additional charge.

### 4. BT Service Management Boundary (SMB)

- **4.1 The SMB of the Service with Managed Routers** is the LAN interface on the Managed Router. This includes provision, maintenance and management of all elements up to the SMB. The cable which connects to the Customer's equipment is the responsibility of the Customer.
- **4.2 The SMB of the Service without Managed Routers** is the network terminating unit of the Access Line. This includes provision, maintenance and management of all elements up to the SMB. The cable which connects the network terminating unit to the Customer's equipment is the responsibility of the Customer.

### 5. The Customer's Responsibilities

- 5.1 If the Customer has a connection to another Internet supplier's network, the Customer will use BGP with a unique autonomous system number for the Customer's network.
- 5.2 If the Customer is moving to the Service from another ISP, then the Customer will notify the local registration authority of the change to the Customer's existing Domain Name(s).
- 5.3 If the Customer orders only the 'secondary DNS' option as part of the Service, it will ensure that its own primary server information is kept up to date.
- 5.3 If the Customer is an ISP, the Customer will:
  - a) include in its contracts with its customers, conditions of use equivalent to those in paragraph 4 of the General Services Schedule.
  - b) if BT is providing IP addresses, ensure that its customers have only a single IP address within the Customer's network; and
  - c) provide a support function for customers connected to its network who shall use such support function to report all faults, queries and complaints. BT will not provide support directly to any of the Customer's customers.
- 5.4 If the Customer provides its own IP addresses, it will ensure that;
  - (a) its existing (Provider Independent Resources) IP addresses are registered with an approved Internet registration authority;
  - (b) these are at least a /24 address block (minimum of 256 addresses);

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- (c) when requested by BT, or if any changes are made by the Customer to the IP address(es), the Customer will provide BT with up-to-date records relating to the IP addresses for publication on the Regional Internet Registry;
- (d) it is familiar with, and complies with the Regional Internet Registry policies that apply to the provision of such IP addresses. Violation of these policies is a material breach of the Agreement and the PIR will return by default to the relevant Regional Internet Registry.
- 5.6 The Customer must ensure that any BT Equipment or Customer Equipment connected to the Access Line is permanently powered and enabled.
- 5.7 If the Customer selects Access Line reliance, it will ensure that any Router provided for use with the resilient Access Line is connected to the same segment on its LAN as the Router for the primary Access Line.

## 6. Charges and Payment Terms

The charges for the Service will comprise some or all of the following components, depending on the Option selected on the Order:

Product	One-time Charge	Recurring Charge	Notes
Access Line	Install/De-install	Monthly	Charges vary by Access Line option, speed, location.
Port	Install/De-install	Monthly	Charges vary by speed, location and resilience (whether primary, secondary (as failover or with load balance).
BT Equipment (Managed Routers)	Install/De-install	Monthly	Charges will be based on the equipment model, cards, location, maintenance and management options ordered.
Service Optional Features			
Domain Name Services ("DNS")	N/A	Monthly charge	Primary DNS is a monthly charge independent of DNS host entries.
			Secondary DNS are supported free of charge.
Miscellaneous			Per request. See Section 6.2 for examples with definitions and applicable Charge structure.
Re-configuration	Install/De- install	Monthly	Per element re-configured. See section 6.3 below for details.

### 6.1 Miscellaneous Charges

### **Customer Domain Incident**

**6.1.1** BT may charge the Customer in accordance with Clause 6.1.2 for investigating an incident where:

- (a) BT does not find an incident; or
- (b) BT's diagnostics indicate that the reason for the incident is a Customer Domain Incident.

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6.1.2 BT will charge the Customer the components set out in the table below. BT will raise such Charges in accordance with the tariffs set out in the Order or as otherwise agreed in writing between BT and the Customer. Charges will be raised in the relevant contract currency using the prevailing rate of exchange.

Charge Category	Charge Component
Standard Helpdesk Support	per incident
Consultancy Helpdesk Support	per hour
Field Engineering (BT Engineers)	Per visit to a Site and varies per country
Field Engineering (3 <sup>rd</sup> Party Engineers)	Per visit to a Site and varies per country

# 6.1.2 Expedite

BT will charge the Customer for any associated costs incurred to meet a request by the Customer for early installation and/or faster fault resolution compared to quoted delivery dates. Any expedited service and related expedited service charge shall be agreed with the Customer and set out in an Order.

# 6.2 Re-configuration Charges

All reconfiguration changes after the OSD must be agreed and documented in a new Order.

If BT needs to upgrade software on a Managed Router then there is no charge for the upgrade unless the software upgrade also requires a hardware upgrade, such as additional memory, in which case the Customer will be charged for the hardware upgrade at the then-current Router charges.

# 6.3 Additional Charges

If the Customer fails to carry out any of the Customer responsibilities set out in section 5 (above) or as set out in the General Terms and Conditions and/or the General Service Schedule, in addition to any other rights or remedies BT has, BT reserves the right to charge the Customer any additional costs that BT incurs as a result of such failure.

# 7. Service Levels for Network Performance

In addition to the Service Levels set out in the General Service Schedule, network performance Service Levels for BT Internet Connect apply to performance measured on and between BT Network nodes (this excludes any Access Line), as follows;

# 7.1 Round Trip Delay

Round trip delay is measured by sending 64 byte test packets from an originating BT Network node to a destination node (which may or may not be the node(s) that the Customer Site is connected to) and back again. If there is a choice of route, results from the fastest are used. The results for each hour are averaged and stored. At the end of each Month the hourly results are averaged.

If the round trip delay Monthly measurement for the selected inter-regional routes is greater than the target below, and on receipt of a valid claim, BT will give the Customer a Service Credit of 4% of the Monthly recurring Charge(s) for the Site for each Site affected.

Monthly Measurement	Target
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Transatlantic	95ms
Intra Europe	45ms
Europe to USA	150ms
Europe to Asia	320ms
Europe to Latin America	260ms

# 7.2 Packet Delivery

Packet delivery is measured by sending 64 byte test packets from an originating BT Network node to a destination node (which may or may not be the node(s) that the Customer Site is connected to) and back again. The percentage of delivered packets is calculated by dividing the number of packets returning by the number sent. Where there is a choice of route the lowest results are used in calculating the measurement. The figures for each hour are stored and are averaged at the end of each Month to calculate the Monthly measurement.

If the packet delivery Monthly measurement for the selected inter-regional routes is lower than the target below, and on receipt of a validated claim, BT will give the Customer a Service Credit of 4% of the Monthly recurring Charge(s) for the Site for each Site affected.

Monthly Measurement	Target
Transatlantic	99.5%
Intra Europe	99.5%
Europe to USA	99.5%
Europe to Asia	99.0%
Europe to Latin America	99.0%

# 7.3 Service Level Exclusions

Service Levels for Availability will not apply to the Service if, when Ethernet access is used, utilisation of the Access Line is in excess of 70%.