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# **ND1210:1998/09**

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**PNO-ISC/SER/010**

**Public Network Features To Support**

**A Messaging Service**

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**PNO-ISC SERVICE DESCRIPTION NUMBER 010**  
**PUBLIC NETWORK FEATURES TO SUPPORT**  
**A MESSAGING SERVICE**

NETWORK INTEROPERABILITY CONSULTATIVE COMMITTEE  
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## **0.2 NORMATIVE INFORMATION**

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### 0.4 HISTORY

Revision	Date of Issue	Updated By	Description
Issue 1	September 1998	S Alexander, BT	First Issue

### 0.5 ISSUE CONTROL

PAGE	ISSUE	DATE
All	Issue 1	September 1998

### 0.6 REFERENCES

[1] Licence granted by The Secretary of State for Trade and Industry to British Telecommunications under Section 7 of the Telecommunications Act 1984

### 0.7 GLOSSARY OF TERMS

#### calling line identity (CLI)

The CLI is either:

a *network number* that unambiguously identifies the ingress port to the public network; or,  
a *presentation number* that identifies the NTP to which a return call can be made.

#### network termination point (NTP)

The definition of Annex A 2(i) of [1] applies for fixed link terminating networks, and is the air interface for terminating mobile networks.

#### originating network

The network to which the customer who originates the call is directly connected.

**service provider (SP)**

An organisation that provides enhanced telecommunications services to its customers.

**Note:** A more complete definition may be found in an OFTEL document "Promoting Competition in Services over Telecommunication Networks", "ANNEX B: Service Provider definition".

**Note:** The SP is connected to a public network operator's network. A service provider may be a public network operator.

**service provider's customer (SPC)**

A customer of the enhanced telecommunications services offered by a service provider.

**Note:** A SPC is connected to the network of a public network operator that may or may not be the same network to which the service provider is connected.

**terminating network**

The network to which the customer who receives a call is directly connected.

**transit network**

A network through which a call passes, but which is neither the *originating network* nor the *terminating network* for that call.

**Note:** A *transit network* acts as an *outgoing network* and as an *incoming network*.

## **0.8 SCOPE**

This document provides an overview of public network features that enable service providers to offer a Messaging Service to single line PSTN customers, multi-line PSTN customers and ISDN customers.

These public network features may be available to service providers who may be connected to any UK public telecommunications network and their customers who may be connected to the same or any other UK public telecommunications network.

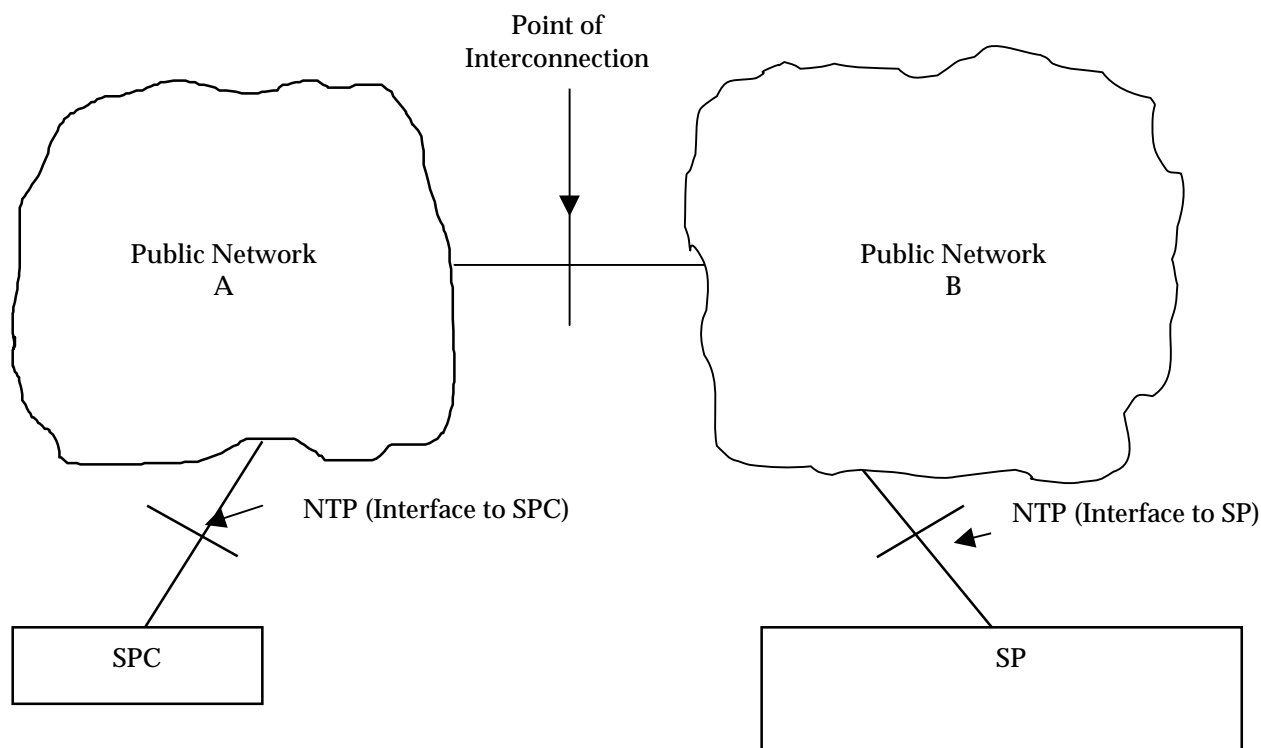
For the purposes of this service description the term public network is generic. It may be interpreted as involving a single network, an originating and terminating network or an originating network, one or more transit networks and a terminating network.

## 1 SERVICE OVERVIEW

A Messaging Service comprises the following elements:

- One or more public telecommunications network(s) including, if appropriate, points of interconnection between them;
- an interface to a service provider; and,
- an interface to a service provider's customer (SPC).

The diagram in Figure 1 shows the interconnection topography.



**Figure 1: Service Topography (showing the case with two public networks)**

In addition to the above, additional features may be provided. This service description only considers the following optional features:

- 1.1 a message waiting indication; and/or,
- 1.2 a control transaction so that the ringing duration before call forwarding may be changed.

## 2 NETWORK FEATURES

- 2.1 The features of a public telecommunications network required in order that a Messaging Service may be offered are as follows:

SEE PAGE 2 FOR THE NORMATIVE INFORMATION

2.1.1 Features provided to the SPC

2.1.1.1 The ability to forward calls intended for the SPC to the SP together with an indication of the reason for forwarding and the identity of the SPC;

2.1.1.2 the ability to access the SP for the purpose of retrieving message(s);

2.1.1.3 optionally, the network operator may offer the SPC a message waiting indication;

2.1.1.4 optionally, if this is allowed by the SP, the SPC may be offered the ability to alter the duration of the alerting signal provided before diverting the call to the SP.

2.1.2 Features provided to the SP

2.1.2.1 the ability to receive calls forwarded from the SPC together with an indication of the reason for forwarding and the identity of the SPC;

2.1.2.2 the ability to be accessed for the purposes of message retrieval;

2.1.2.3 optionally, the network operator may offer the SP the ability to instruct the network to which the SPC is connected to set or cancel a message waiting indication provided to the SPC;

2.1.2.4 optionally, the network operator may offer the SP the ability to instruct the network to which the SPC is connected to alter the duration of the alerting signal provided to the SPC before forwarding the call to the SP.

2.2 Interconnection of public telecommunications networks is required such that the above features can continue to be supported in cases where the SP and the SPC are not receiving telecommunications services from the same public network operator.

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