

# ISO/IEC 10021-1:2003-11 (E)

## Information technology - Message Handling Systems (MHS) - Part 1: System and service overview

---

<b>Contents</b>		<b>Page</b>
<b>1</b>	<b>Scope .....</b>	<b>1</b>
<b>2</b>	<b>Normative references .....</b>	<b>1</b>
<b>3</b>	<b>Terms and definitions .....</b>	<b>3</b>
<b>3.1</b>	<b>Open Systems Interconnection .....</b>	<b>3</b>
<b>3.2</b>	<b>Directory Systems .....</b>	<b>4</b>
<b>4</b>	<b>Abbreviations .....</b>	<b>4</b>
<b>5</b>	<b>Conventions .....</b>	<b>5</b>
<b>6</b>	<b>Purpose .....</b>	<b>5</b>
<b>7</b>	<b>Functional Model of MHS .....</b>	<b>5</b>
<b>7.1</b>	<b>Description of the MHS Model .....</b>	<b>5</b>
<b>7.2</b>	<b>Structure of Messages .....</b>	<b>6</b>
<b>7.3</b>	<b>Application of the MHS model .....</b>	<b>7</b>
<b>7.3.1</b>	<b>Physical Mapping .....</b>	<b>7</b>
<b>7.3.2</b>	<b>Organizational Mapping .....</b>	<b>8</b>
<b>7.3.3</b>	<b>Administration Management Domain .....</b>	<b>8</b>
<b>7.3.4</b>	<b>Private Management Domain .....</b>	<b>8</b>
<b>7.4</b>	<b>The Message Store .....</b>	<b>9</b>
<b>7.4.1</b>	<b>Physical Configurations .....</b>	<b>12</b>
<b>7.4.2</b>	<b>Organizational Configurations .....</b>	<b>12</b>
<b>8</b>	<b>The Message Transfer Service .....</b>	<b>12</b>
<b>8.1</b>	<b>Submission and Delivery .....</b>	<b>12</b>
<b>8.2</b>	<b>Transfer .....</b>	<b>12</b>
<b>8.3</b>	<b>Notifications .....</b>	<b>12</b>
<b>8.4</b>	<b>User Agent .....</b>	<b>13</b>
<b>8.5</b>	<b>Message Store .....</b>	<b>13</b>
<b>8.6</b>	<b>Access Unit .....</b>	<b>13</b>
<b>8.7</b>	<b>Use of the MTS in the Provision of Various Services .....</b>	<b>13</b>
<b>9</b>	<b>The IPM Service .....</b>	<b>13</b>
<b>9.1</b>	<b>IPM Service Functional Model .....</b>	<b>13</b>
<b>9.2</b>	<b>Structure of IP-messages .....</b>	<b>13</b>
<b>9.3</b>	<b>IP-notifications .....</b>	<b>14</b>
<b>10</b>	<b>Intercommunication with Physical Delivery Services .....</b>	<b>15</b>
<b>10.1</b>	<b>Introduction .....</b>	<b>15</b>
<b>10.2</b>	<b>Organizational Configurations .....</b>	<b>16</b>
<b>11</b>	<b>Specialized Access .....</b>	<b>16</b>
<b>11.1</b>	<b>Introduction .....</b>	<b>16</b>
<b>11.2</b>	<b>Telex Access .....</b>	<b>17</b>
<b>11.2.1</b>	<b>Registered Access to the IPM Service .....</b>	<b>17</b>
<b>11.2.2</b>	<b>Non-registered (Public) Access to the IPM Service .....</b>	<b>17</b>
<b>11.3</b>	<b>Facsimile Access .....</b>	<b>17</b>
<b>11.3.1</b>	<b>Non-registered (Public) Access from the IPM Service .....</b>	<b>17</b>

12	Naming and Addressing .....	17
12.1	Introduction .....	17
12.2	Directory Names .....	17
12.3	OR-Names .....	18
12.4	OR-Addresses .....	18
13	MHS Use of Directory .....	18
13.1	Introduction .....	18
13.2	Functional Model .....	19
13.3	Physical Configurations .....	19
14	Distribution Lists in MHS .....	20
14.1	Introduction .....	20
14.2	Properties of a DL .....	20
14.3	Submission .....	21
14.4	DL Use of a Directory .....	21
14.5	DL Expansion .....	21
14.6	Nesting .....	21
14.7	Recursion Control .....	21
14.8	Delivery .....	21
14.9	Routing Loop Control .....	21
14.10	Notifications .....	22
14.11	DL Handling Policy .....	22
15	Security Capabilities of MHS .....	22
15.1	Introduction .....	22
15.2	MHS Security Threats .....	22
15.2.1	Access Threats .....	22
15.2.2	Inter-Message Threats .....	22
15.2.3	Intra-Message Threats .....	23
15.2.4	Data Store Threats .....	23
15.3	Security Model .....	23
15.3.1	Secure Access Management and Administration .....	23
15.3.2	Secure Messaging .....	23
15.4	MHS Security Capabilities .....	24
15.5	Security Management .....	25
15.6	MHS Security Dependencies .....	26
15.7	IPM Security .....	26
16	Conversion in MHS .....	27
17	Clause 17 of the corresponding ITU-T Recommendation is not part of this International Standard .....	28
18	Elements of Service - Purpose .....	28
19	Elements of service - Classification .....	31
19.1	Purpose of Classification .....	31
19.2	Basic Message Transfer Service .....	32
19.3	MT Service Optional User Facilities .....	32
19.4	Base MH/PD Service Intercommunication .....	34
19.5	Optional User Facilities for MH/PD Service Intercommunication .....	34
19.6	Base Message Store .....	34
19.7	MS Optional User Facilities .....	35
19.8	Basic Interpersonal Messaging Service .....	35
19.9	IPM Service Optional User Facilities .....	36
	Annex A (informative) Glossary of Terms .....	40
	Annex B (informative) Definitions Of Elements Of Service .....	55
	Annex C (informative) Elements of service changes from 1992 .....	80