

INTERNATIONAL STANDARD

**ISO
9314-2**

First edition
1989-05-01

Information processing systems — Fibre Distributed Data Interface (FDDI) —

Part 2 : Token Ring Media Access Control (MAC)

*Systèmes de traitement de l'information — Interface de données distribuées sur
fibre (FDDI) —
Partie 2 : Mécanisme d'accès au support de l'anneau à jeton (MAC)*



Reference number
ISO 9314-2 : 1989 (E)

ISO 9314-2 : 1989 (E)

Contents

| | Page |
|---|------|
| Foreword | iv |
| Introduction | v |
| 1 Scope | 1 |
| 2 Normative references | 2 |
| 3 Definitions | 2 |
| 4 Conventions and abbreviations | 4 |
| 4.1 Conventions | 4 |
| 4.2 Abbreviations | 5 |
| 5 General description | 6 |
| 6 Services | 7 |
| 6.1 MAC-to-LLC services | 7 |
| 6.2 PHY-to-MAC services | 11 |
| 6.3 MAC-to-SMT services | 13 |
| 7 Facilities | 21 |
| 7.1 Symbol set | 21 |
| 7.2 Protocol Data Units | 23 |
| 7.3 Fields | 24 |
| 7.4 Timers | 31 |
| 7.5 Frame counts | 34 |

© ISO 1989

All rights reserved. No part of this publication may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying and microfilm, without permission in writing from the publisher.

International Organization for Standardization
Case postale 56 • CH-1211 Genève 20 • Switzerland

Printed in Switzerland

| | |
|----------------------------------|-----------|
| 8 Operation | 35 |
| 8.1 Overview | 35 |
| 8.2 Structure | 40 |
| 8.3 Receiver | 41 |
| 8.4 Transmitter | 48 |

Tables

| | |
|---|-----------|
| Table 1 Interpretation of FC field | 43 |
|---|-----------|

Figures

| | |
|--|-----------|
| Figure 1 Token ring configuration example | 6 |
| Figure 2 MAC receiver state diagram | 57 |
| Figure 3 MAC transmitter state diagram | 59 |

Annexes

| | |
|---|-----------|
| Annex A Addressing hierarchical structuring for locally-administered addresses | 61 |
| A.1 General structure | 61 |
| A.2 Group addressing modes | 62 |
| Annex B Frame Check Sequence | 63 |
| B.1 Description | 63 |
| B.2 Generation of the FCS | 64 |
| B.3 Checking the FCS | 64 |
| B.4 Implementation | 65 |
| B.5 Related standards | 65 |
| Figure B.1 FCS implementation example | 66 |