

AS 60870.4—1998  
IEC 60870-4:1990

Australian Standard<sup>®</sup>

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**Telecontrol equipment and systems**  
**Part 4: Performance requirements**

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This Australian Standard was prepared by Committee IT/24, Supervisory Control and Data Acquisition. It was approved on behalf of the Council of Standards Australia on 5 January 1998 and published on 5 April 1998.

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**Part 4: Performance requirements**

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## PREFACE

This Standard was prepared by the Standards Australia Committee IT/24, Supervisory Control and Data Acquisition.

The Standard is identical with and has been reproduced from IEC 60870-4:1990, *Telecontrol equipment and systems, Part 4: Performance requirements*.

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This Standard is identical with a pre-1997 document therefore it uses the old series of numbers.

The objective of this Standard is to provide manufacturers and users of telecontrol equipment and systems with a set of rules for accessing and specifying performance requirements in order to determine the requirements for a particular telecontrol system to be used in Australia.

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## CONTENTS

Clause	<i>Page</i>
1. Scope .....	1
2. Object .....	1
3. Classification of operational parameters .....	2
3.1 Reliability .....	3
3.2 Availability .....	4
3.3 Maintainability .....	5
3.4 Security .....	7
3.5 Data integrity .....	7
3.6 Time parameters .....	9
3.7 Overall accuracy .....	12
4. Expandability .....	15
5. Influence of telecontrol equipment on the environment .....	16
5.1 Electrical influence .....	16
5.2 Acoustic noise .....	17
5.3 Thermal influence .....	17
APPENDIX A — Measures to enhance system performance .....	18
APPENDIX B — Evaluation of expandability .....	25
TABLES:	
1 Reliability classes .....	3
2 Availability classes .....	5
3 Maintainability classes .....	6
4 Repair time classes .....	7
5 Data integrity classes .....	8
6 Separating capability classes .....	11
7 Time resolution classes .....	11
8 Overall accuracy classes .....	14
9 Starting current classes .....	16
B.1 Extensions to process data .....	25
B.2 Extensions to application functions .....	26
B.3 Extensions to additional processing functions .....	27
B.4 Extensions to data transmission .....	27
FIGURES:	
1 Processing of analog information .....	13
2 Noise criteria (NC) curves for speech communication .....	17



## AUSTRALIAN STANDARD

# TELECONTROL EQUIPMENT AND SYSTEMS

## Part 4: Performance requirements

### INTRODUCTION

Reliable and secure remote monitoring and control of a geographically widespread process is the ultimate goal of a telecontrol system. This standard covers those aspects which contribute to achieving a level of system performance consistent with that goal.

The approach adopted in this standard has been to treat the subject of performance requirements on the basis of the inherent properties of telecontrol systems.

The inherent properties of a system are those intangibles, such as availability, time parameters, etc., which in many ways affect the overall system performance. During normal system operation, these properties and their effect on the system performance go largely unnoticed. Their real value is only noticed in exceptional circumstances, such as on detection of a fault, or when it is necessary to extend the system. The system performance, especially under these conditions, reflects the consideration given to these properties in the planning, design and manufacture of the equipment.

In determining the performance requirements for a particular telecontrol system, care should be taken to stipulate standards which are adequate for the specific application, without being tempted to place excessive demands. A balance should be found between the ideal requirements on the one hand, and the technical and financial consequences on the other hand.

#### 1. **Scope**

This series of standards applies to telecontrol equipment and systems with coded bit serial data transmission for monitoring and control of geographically widespread processes. The scope of this standard embraces telecontrol systems in the restricted sense, as shown in IEC Publication 870-1-1, figure 2.

#### 2. **Object**

This part deals with those characteristics which affect the performance of telecontrol systems and relates the characteristics to the application and processing functions.

The object of this part is to establish a set of rules which can be used to assess and specify the performance requirements of telecontrol systems.