

SAA HB113—1998

Handbook

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**RESIDUAL CURRENT DEVICES—  
What they do and how they do it**

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# Residual current devices— What they do and how they do it

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## PREFACE

This Handbook was prepared in cooperation with the Joint Standards Australia/Standards New Zealand Electrotechnology Standards Policy Board and is the result of a consensus among members of the Joint Policy Board that it be produced as an Australian publication. It describes what a residual current device (RCD) is and its ability to prevent serious electric shock. It also contains information on RCDs, covering—

- (a) the effect of current flowing through the human body as related to the potential for an RCD to save life;
- (b) the principle of operation of an RCD;
- (c) the performance of RCDs;
- (d) their forms of construction; and
- (e) problems in their installation and use.

The text was provided by Mr Ron Thomson AM MIEAust CPEng who, as well as participating in the work of many Standards Australia Committees, is Chairman of Subcommittee EL/4/9, Circuit Breakers and Residual Current Devices. Mr Thomson is also an Australian representative on the International Electrotechnical Commission (IEC) working groups dealing with RCDs.

A list of referenced Standards is contained in Appendix A.

This Handbook will be reviewed periodically to take account of changes to the Standards covering RCDs.

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