Shortform Catalogue



Memory and Logic Programmer Range Elan Digital Systems Ltd.

Elan's strengths are derived from:

* PRODUCT RELIABILITY & INTEGRITY - field proven programming yields in excess of 99.5% with extremely low down-time.

* TECHNICAL SUPPORT - whether solving an interface protocol problem or responding to the latest devices, qualified local staff are eager to assist.

* INNOVATION - many of the best ideas now used in this industry originated with Elan products: device algorithms easily updated by replaceable cartridge (disk or card); programmable function keys to quickly store/retrieve repeated routines; and now overall device reading and programming times CUT BY FACTORS OF 2 TO 20 TIMES - a vital consideration as device sizes multiply. Plus scores of other advanced features to simplify the programming task, either in stand-alone operation or remotely from a host computer.



1130 Total Site Universal Programmer

Total device coverage: PLD, PROM, EPROM, EEPROM, Microcontrollers etc. High yield performance at a low price with permanent modules (stacks)

- Stand-alone or PC/MDS remote operation with simple commands.
- Uses latest approved algorithms including "Flash".
- Exclusive "Alternative device/source" selection allows cross-referencing. All device types key selectable.
- 512K Bytes RAM & PC Driver standard
- Instant cartridge updates for new devices and protocols.
- Ten programmable function keys.
- Interface to any computer or development
- High programming yields with approved algorithms.
- ELAN LOG/iC Design Compiler option.
- Optional "Stacks" for fast Gang/Set EPROM/ EE-PROM's, 8 or 16 site for 28 to 40 pin devices.



1000 Series Stand-alone Programmers (uniquely expandable)

Dedicated to specific device technologies with the highest programming yields available!

The Universe 1000 Series offer a low cost starting point, to program all EPROM's, PLD's, PROM's or EPLD's. Dedicated programmers, yet expandable to full universal configuration, equal to the 1130 Total-Site programmer.

Standalone models in the 1000 Series:

1011: Dedicated PAL/IFL programmer (L-Stack): PAL, CPAL, EPAL, IFL, FPLA, fuse edit, vector testing. 1012: Dedicated Bipolar PROM/EPROM programmer (P-Stack): Bipolar PROM, CPROM, EPROM, EEPROM, PLE from 256 bit to multi-megabit.

1013: Dedicated Set/Gang EPROM MOS Programmer (G-Stack): Set/Gang EEPROM. Available in 8 or 16 site options.

1014: Dedicated EPLD/PAL Programmer (F-Stack): CPAL, EPAL, GAL, EPLD, fuse edit and vector testing plus expansion for LCC/PLCC.

1015: Dedicated 40 pin EPROM Programmer (H-Stack): Set/Gang EPROM, EEPROM, for 40 pin devices, Available in 8 or 16 site options.

1126: Dedicated 2-stack (F & L) PLD Programmer: PAL, CPAL, EPAL, GAL, EPLD, IFL and FPLA with fuse edit, vector testing and expansion for LCC/PLCC.

Ask for the "SHOW UNIVERSE" demo disk.



Low Cost, High Performance EPROM/EEPROM Programmers

with EF-PER (tm) (Extra Fast Programming Enhancement Routine)

A complete range of flexible, low-cost EPROM/EEPROM Programmers for industrial and commercial applications; PC based or Standalone; development or production. Every model consists of an MCU (Master Control Unit) and one replacable ZIFPAC module.

Future expandability is assured. ZIFPACs support many device technologies in different site configurations. They are interchangable within the 3000, 4000 and 5000 Series ranges, subject only to certain "master socket" applications. Instant firmware updates are provided with a "micro-cartridge". Programmable-logic based design permits easy hardware reconfiguaration to support future device innovation. These features ensure that future pro-

gramming needs will be met!
Programming SPEED and high programming YIELD separate Elan programmers from the competition. Savings made by purchasing other very low-priced programmers are quickly lost if production throughput is decreased or if costly devices are destroyed.

Multiple-site ZIFPAC's include software controlled, indi-

vidually buffered sites, to allow full Set programming (softset). Optional enhancements allow extremely fast set programming with Elan's exclusive ES-PER (tm) (Extra fast Set Programming Enhancement Routine).

3000 Series PC Remote EPROM / EEPROM Programmers

PC Remote EPROM Programmer with the fastest direct programming. Combines high speed performance and full support at a Low Price - more effective than PC cards!

- EPROM/EEPROMs (2716 to latest Megabit devices), Microcontrollers, DIL, PLCC etc.
- · Operated from the PC keyboard, using clear menu driven windows, approved algorithms.
- · Fully compatible with existing PC data files, including those prepared for other programmers.
- IBM PC based. No PC expansion slot used.
- Programming times (down-load to verified device) cut by up to 95%.
- SINGLE, SET and GANG programming in 8, 16, 32 and 64 bit word sizes and Page-write.
- Auto-Configure RS232 serial port(s) up to 38,400 Baud with selectable formats.
- Never needs RAM expansion, no matter how large EPROMs become.

Models available for 3000 Series: (see ZIFPACs) 3-132 3-232 3-840 3-148 3-154 3-142 3-832 3-PLC 3-151 3-187

Ask for "SHOW 3000" demo disk .





4000 Series Production EPROM/EEPROM Copiers

An eight gang 28, 32 or 40 pin Copier for the fastest gang copying available! Easy to operate - built to last - designed with production in mind.



- EPROM/EEPROMs (2716 to Megabit devices)
- Copy from master or PC RAM, single, set or gang modes (24 pin to 40 pin multi-megabit EPROM's).
- Programming times (from Master to verified device) cut by 50% or more over the competition (throughput more than doubled).
- Direct device selection by manufacturer (family), identification or direct equivalents.
- · RS 232 interface for remote operation.
- · Internally identified devices are automatically selected and configured.

Models available for 4000 Series: (see ZIFPACs) 4-928 4-932 4-940

5000 Series Editing EPROM/EEPROM Programmers

Extremely advanced, Incredibly fast! An intelligent range of editing EPROM Programmers, (single, gang or set). Unparalleled Integrity, Yield and Protection!

- EPROM/EEPROMs (2716 to latest Megabit devices), Microcontrollers, DIL, PLCC etc.
- Programming (from RAM or master to verified device) up to 10 times faster (more with Page-write).
- Stand-alone or remote operation compatible with Data I/O codes, IBM PC, MDS, VAX etc.
- High speed Set programming and instant checksum options.
- Device selection by manufacturer (family), identification or direct equivalents.
- Fastest approved algorithms including "ETOX"(tm) flash & "Page-write" devices.
- · Instant "Read" and "Verify" eliminates waiting
- Extensive keyboard editing directly in 8, 16 or 32 bit word lengths.
- 5 and 8 site models (eg 5-832) are supplied with ES-PER (tm), allowing set programming as fast as single site operations.

Models available for 5000 Series: (see ZIFPACs)

5-132	5-532	5-928	5-148	5-187
5-142	5-832	5-932	5-151	5-PLC
E 222	E 010	E 040	E 151	





ZIFPAC's for the Elan Programmers



Z	FPAC I	Models	3000	4000	5000
7	 -132: -142: -232: -532: -832: -928: -932: -840: -940: -148: -151: -154: -187: 	1 x 32	Yes Yes No Yes No No Yes No Yes Yes	No No No No No Yes Yes No Yes No No No Yes	Yes

Accessories

OPTIONS:

PLCC socket converters, SO converters, EXFILE PC Driver Software (5.25" or 3.5"), EASYCOM Remote Driver (IBM or VAX). Elan LOGIC Design Compiler. E13 adapter for 3 voltage EPROMS. Customized onboard ICP (In-Circuit Programming).

EASYCOM/1, EASYCOM/2 & EXFILE

Sophisticated and easily operated remote drivers with efficient file handling capabilities suitable for operating most programmer functions from a PC keyboard. Easycom/2 includes powerful features for editing and label designing. Easycom/V (E63) is available for VAX computers, including use with a remote terminal. EXFILE is a powerful menu-driven program for the 3000 Series, but is optionally available for the 4000 and 5000 Series, with file handling and editing.

ELAN LOG/iC

This software package is a comprehensive logic design compiler suitable for all PLD types - including PLDs used in MARC (Minimized Address-space ROM-based Controller) applications. Cost saving features include: fast and efficient optimization, automatic test vector generation and direct graphic representations. Available for IBM PC (no expansion slot required), VAX, Appollo and Siemens work-stations.

MICROPROCESSOR ADAPTERS

Microprocessor ZIFPACs are available for the 3000, 4000 and 5000 Series models. For the 1130 and 1000 Series, three adapters (E4, E5 & E7) cover Intel, NEC, Motorola and most other equivalent manufacturers.

Elan Digital Systems was formed in 1976 to offer specialized design services in microprocessor applications. From this experience was derived the original Elan proprietary EPROM programmer design. Since then Elan have rapidly developed a wide range of products in this very specialized field, from development to production applications; from dedicated device programmers to multi-function universal and "on-board" or ICP (In-Circuit Programming) programmers/testers; from support instrumentation to high level logic compilers.

Elan's world-wide reputation, as a leader in this industry, has

Elan's world-wide reputation, as a leader in this industry, has been built on years of proven response to customers' requirements and major device manufacturers' approvals, adhering strictly to all specified algorithms.

All of Elan's latest products are designed with highly integrated surface mount components and are manufactured in-house with advanced production, assembly and test facilities.

A series of demo disks are available free of charge. They describe Elan's entire range of products with interactive examples to be run on any IBM PC with a color monitor.

SHOW ELAN: (interactive Elan product range guide)

SHOW UNIVERSE: (interactive operation to the 1000 Series range)

SHOW 3000: (interactive operation of the 3000 Series)

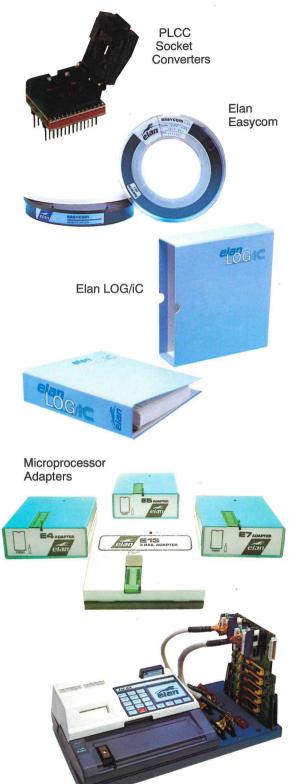
SHOW ICP: (features of In-Circuit Programming)

EASYCOM (covers all Easycom versions)

ELAN LOG/iC: (examples of this compiler's features)

(Easycom, SHOW 3000 and LOG/IC demo disks also run on monochrome

CONTACT YOUR NEAREST SALES SUPPORT OFFICE. Ask for our free demo disks (IBM PC with color or mono).



(In-Circuit Programming)

Specifications:

1130 Total Site Universal Programmer (Standalone or Remote)

Parallel portsOne
Max power required40 Watts
• Dimensions
 Weight .10Kg (22 lb)
OptionsLCC/PLCC/SO Socket Convertors

1000 Series Stand-alone/Remote Programmers (expandable to 2, 3, 4 or 5 Stack Universals)

Standard RAM	 Parallel ports
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3000 Series PC Remote E/EPROM Programmers (Over 11 models with ZIFPACs)

Device coverage	2716 to multimegabit & Micro's	Power consumption	45 Watts Max.
Standard RAM	PC's memory	• DimensionsL. 3	303 x D. 255 x H. 95mm
Update via	Replaceable Micro-Cartridge	Weight	2.8Kg (6.2 lb)
Serial RS232 ports	Two	 OptionsLCC/PLCC 	/SO Socket Convertors
 Auto baud Rate Selection 	(EXFILE incl.) up to38,400		

4000 Series Production E/EPROM Copiers (3 models with ZIFPACs)

 Device coverage	Power consumption45 Watts Max.
RAM: (with EXFILE Option)PC's Memory	• Dimensions L. 303 x D. 255 x H. 95
Update viaReplaceable Micro-Cartridge	Weight2.8Kg 6.2 lb)
Serial RS232 portsTwo	 Options PC Remote Driver, LCC/PLCC/SO Convertors

5000 Series Editing E/EPROM Stand-alone/Remote Programmers (Over 14 models)

 Device coverage 	2716 to multimegabit & Micro's	Power consumption45 Wat	tts Max.
 Standard RAM 	256K bytes (expandable)	• Dimensions L. 303 x D. 255	x H. 95
Max. RAM		Weight2.8Kg	(6.2 lb)
Update via	Replaceable Micro-Cartridge	 OptionIndividual LCC/PLCC/SO Socket Con 	vertors
Serial RS232 ports	Two	and a PC Remote Driver	

All Programmers come with one year warranty on hardware and software.

ZIFPACs (3000, 4000, and 5000 Series)

Single EPROM/EEPROM ZIFPAC Models:-

- -132: 1 x 32 pin ZIFPAC 24, 28 & 32 pin E/EPROMs • -142: 1 x 32 & 1 x 40 pin ZIFPAC 24, 28, 32 & 40 pin E/EPROMs Gang and Set EPROM/EEPROM ZIFPAC Models:
- -232: A Softset 2 x 32 pin ZIFPAC (24, 28 & 32 pin E/EPROMs)
 -532: Set/Gang master + 4 x 32 pin (24, 28 & 32 pin E/EPROMs)
 -832: A Set 8 x 32 pin ZIFPAC (24, 28 & 32 pin E/EPROMs)

- -928: Gang/Softset Master + 8 x 28 pin (24 % 28 pin E/EPROMs)
 -932: Gang/Softset Master + 8 x 28 pin (24 % 28 pin E/EPROMs)
 -932: Gang/Softset Master + 8 x 32 pin (24, 28 % 32 pin E/EPROMs)

 -840: A Set 8 x 40 pin ZIFPAC (40 pin E/EPROM's)

 -940: Gang/Softset Master + 8 x 40 pin (40 pin E/EPROM's)

 Microport ZIFPAC (letter) NEC/ONE/Suities (8748 Sories micros)
- -148: 1 x 40 pin ZIFPAC (Intel/ NEC/OKI/Fujitsu 8748 Series micros)
 -151: 1 x 40 pin ZIFPAC (Intel/ NEC/AMD 8751 Series micros)
 -154: 2 x40 pin ZIFPAC (8748/8751 Series micros)
- -187: 2 x40 pin, 1 x 48 pin ZIFPAC (8748/8751/8795 Series micros) Gang and Set Special Packages ZIFPAC Models:-
- -PLC: Set/Gang 4 x PLCC/SO ZIFPAC

Fax: (0293) 518591

"ETOX" and "Quick Pulse" are registered trade marks of Intel. "EF-PER" and "ES-PER" are registered trademarks of Elan Digital Systems Ltd.

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"VAX" a registered trademark of Digital Equipment Corp.

See our other Data Sheets for details.

Elan Digital Systems reserve the right to alter specifications without notice.

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