

# **CML Semiconductor Products**

PRODUCT INFORMATION

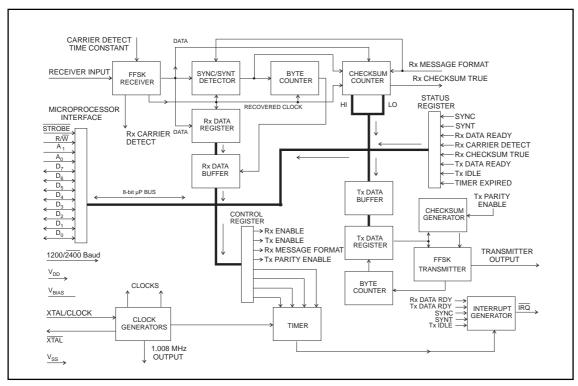
# FX529 FFSK Modem for Trunked Radio Systems

Product Summary

#### **Features**

- PAA 1382 and General Purpose Trunked Radio Applications
- Meets ETSI I-ETS 300 230 Binary Signalling Specification
- Full-Duplex 1200 Baud Operation
- High Intelligence
- Error Checking in Receive

- Frame SYNC/SYNT Detection
- Preamble Generation
- µProcessor Compatible Interface
- Carrier Detection On-Chip
- General Purpose Timer
- Error Check Word Generation



**FX529** 

# **Brief Description**

The FX529 is a single-chip CMOS 1200 baud FFSK Modem, designed primarily for use in trunked radio systems but may also be employed in other general purpose radio or line data communication applications.

This device conforms to both the PAA 1382 French trunked radio, and the proposed ETSI I-ETS 300 230 "Binary Interchange of Information and Signalling" specifications.

The FX529 is full duplex at 1200 baud and includes an 8-bit parallel microprocessor interface and a programmable timer which may be set for interrupt periods of between 8 and 120 bits.

Preamble data and an error-check word are automatically generated in the transmit mode.

Error checking is performed and the 16-bit SYNC

("1011010000110011") or SYNT ("0100101111001100") word detected in the receive mode.

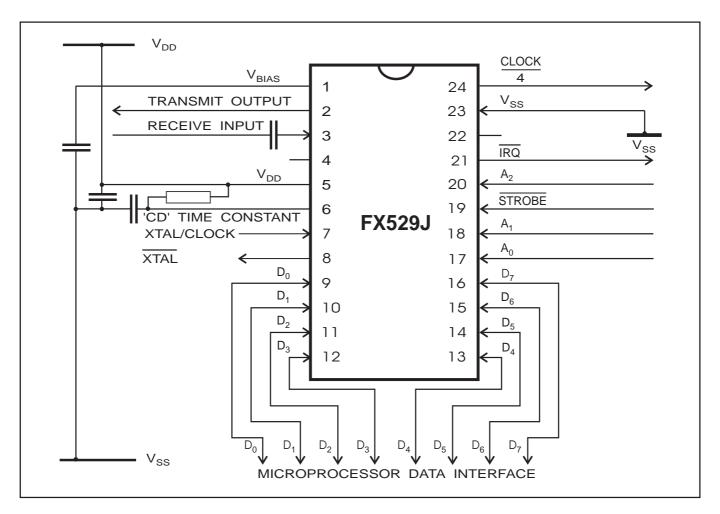
An on-chip Xtal/clock generator requiring an external 4.032MHz Xtal or clock input provides all microcircuit filter sampling clocks and modem timings whilst also supplying a "Clock " 4" output (1.008MHz).

Pin and function compatible with the FX429, the FX429 data sheet should be consulted when using this device

The FX529, which has a powersaving facility, requires a single 5-volt power supply and is available in both cerdip DIL and plastic SMD packages.

# **FX529 - Brief Specification**

Function	FFSK Modem for trunked radio systems
Supply Voltage Range	4.5 to 5.5 volts
Supply Current	(5.0V) 7.0 mA maximum
Control	8-bit parallel
Duplex	Full
Data Rate	1200 baud
Xtal/Clock Frequency	4.032 MHz
Package Styles	24-pin cerdip DIL (FX529J) 24-pin PLCC (FX529LG) 24-pin PLCC (FX529LS)



## **Package Styles Available**

**FX529J** 24-pin cerdip DIL (J4)

**FX529LG** 24-pin quad plastic encapsulated

bent and cropped (L1)

FX529LS 24-lead plastic leaded

chip carrier (L2)

Full details of this product are available from CML or its distributors

CML does not assume any responsibility for the use of any circuitry described. No circuit patent licences are implied and CML reserves the right at any time without notice to change the said circuitry.



#### **CML Product Data**

In the process of creating a more global image, the three standard product semiconductor companies of CML Microsystems Plc (Consumer Microcircuits Limited (UK), MX-COM, Inc (USA) and CML Microcircuits (Singapore) Pte Ltd) have undergone name changes and, whilst maintaining their separate new names (CML Microcircuits (UK) Ltd, CML Microcircuits (USA) Inc and CML Microcircuits (Singapore) Pte Ltd), now operate under the single title CML Microcircuits.

These companies are all 100% owned operating companies of the CML Microsystems Plc Group and these changes are purely changes of name and do not change any underlying legal entities and hence will have no effect on any agreements or contacts currently in force.

### **CML Microcircuits Product Prefix Codes**

Until the latter part of 1996, the differentiator between products manufactured and sold from MXCOM, Inc. and Consumer Microcircuits Limited were denoted by the prefixes MX and FX respectively. These products use the same silicon etc. and today still carry the same prefixes. In the latter part of 1996, both companies adopted the common prefix: CMX.

This notification is relevant product information to which it is attached.

Company contact information is as below:



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