



# **DEVICECLIP**

DeviceClip is the new ISP (In-system Programming) tool designed for devices and systems programming, highly modular and a virtually unlimited number of true parallel channels.

# The Top 10 Reasons why DeviceClip is rapidly becoming the standardde-facto ISP tool



- Compact Size: Extremely compact size (4) channels in 107x60x15mm) allows placement very close to the target devices. The tool can be easily integrated into Test Fixtures, keeping connections as short as possible.
- Only One Tool: Advanced architecture virtually supports every type of Flash-based Microcontroller. PLDs and Serial Memories. No need to choose a mix of several different ISP tools. **DeviceClip** supports, at the very same time, concurrent parallel programming of any mix of heterogeneous devices.
- Simultaneous Programming: Multi-channel design allows programming operations to be performed in a true-parallel fashion without any type of restriction.
- High Channel Count: Is modular. The number of channels (the number of target devices) of one unit is four. Several units can be natively cascaded to get a single programming tool provided of 8, 12, 16, up to 64 channels.

- Stand-Alone Capability: Offers both Host-Controlled (typically LAN or RS-232) and Stand-Alone Stand-Alone operations. In mode, no host is required, the tool is controlled by a opto-isolated, handshaking I/O interface.
- Ease of Use: Was conceived and designed to provide users with an unrivalled flexibility. Every single detail was studied to simplify system integration (with ATE, PC, etc.). First in its category of tools, DeviceClip's control panel is not a software application to be installed, but a standard HTML5 interface, perfectly compatible with all operating systems. Operations are controlled by means of a simple browser.
- Cost Reduction: Advanced characteristics allow time-saving policies. increase reliability. keep set-up and operation industrial costs as low as never seen before for a professional-class tool.













- Industry Fastest ISP: Programming speed meets the maximum allowed by devices. Each target channel has the potential of supporting up to 200 Mbit/s bitrate.
- Robust Target Interface: Unlike most ISP tools, has an electrical interface with targets studied to withstand over-currents and over-voltages. I/O stages never break. Reliability is higher than any other commercial ISP solutions.

#### Fase of Use

DeviceClip is provided with an embedded control panel, thus no host software installation is required. Compatible with every operating system, all you need to fully control DeviceClip browser. DeviceClip iust а architecture allows the building of ISP tools provided with a large number of channels with no need of routers or switches. Only one host interface is required for managing all channels. And, when used in stand-alone mode, the host computer is not necessary at all.

# Reliability

All DeviceClip signals are very robust and protected from overvoltages or shorts from the target PCB. **Operations** performed DeviceClip are time-stamped and saved in log files on the SD Card, always available for traceability and analysis. Status of programming operations is constantly monitored for any faulty condition, immediately communicated to operators through a series of alarms. Also, very short target wiring reduces signal noise while enhancing process reliability.

## Advantages

- Comprehensive device support
- Maximum programming speed
- Extremely high number of parallel ISP channels
- Higher reliability
- Lower manufacturing cost

### **Target Personalization**

DeviceClip runs a powerful server for the management of target variables (serial numbers, MAC addresses, calibration values or any other user-defined customization data). The result is a very easy target PCBA personalization. Target variables management can accomplished in stand-alone operating mode, when no host is connected. User's pre-defined **CSV** files containing board target personalization data can be loaded on the SD card for being automatically managed by LynOS.

## Compact

DeviceClip is very compact (only 100 x 60 x 10 mm), it was designed to be placed extremely close to the target (only a few millimeters This very compact size allows DeviceClip's integration inside any test fixture. DeviceClip is a perfect solution for complex test fixtures, where space constraints often prevent the placement of tools close to the target.

### **Lower Operation Cost**

Industrial ISP equipment has so far been implemented by using different, non universal tools from quite a few vendors. This leads to a for ISP implementation manufacturing lines. Different tools need more learning time (different interfaces, different commands, more spare parts, etc.).







