

**Product  
Summary  
Sheet**

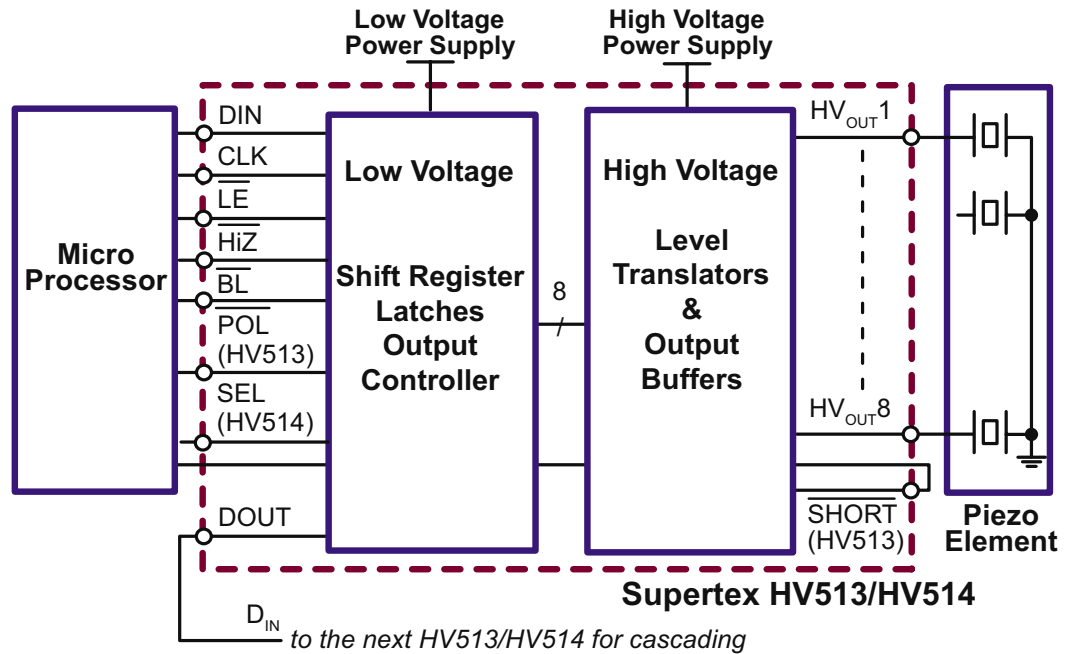
**High Voltage 8-Channel  
Serial to parallel Converters**

**Applications:**

- ▶ Multiple segment EL display
- ▶ Piezoelectric transducer driver
- ▶ Braille driver
- ▶ Weaving machine applications
- ▶ Printers Displays
- ▶ MEMS



24/20-Lead SOW



**Block Diagram**

**Product Overview:**

The HV513 and the HV514 are low voltage, serial to high voltage (HV), 8-channel parallel converter integrated circuits (ICs). They are both configured with one low voltage serial input to 8 parallel high voltage outputs. By combining high voltage and low voltage devices in one IC, they replace a large number of discrete components, including multiple high voltage N-channel and P-channel MOSFETs in applications such as driving piezoelectric transducers and flat panel displays in push-pull mode. Both can operate at 250V and feature an output current of +/-20mA per channel, driving heavy loads where a larger current is required to drive large transducers and displays. The serial input can operate up to 8MHz.

These devices were also designed to drive medium to high capacitive loads, such as Braille and weaving machine applications. The 8-channel output configuration matches Braille modular application requirements and allows for a simplified replacement procedure. Only the HV513 features output short circuit detection that is used to prevent damage to the IC. Low power level shifting and break-before-make output control circuitry that reduces overall power consumption is common to both devices. For flat panel display and printer applications, their small size and fine output pitch allow them to easily fit on the back panel of displays or on the head of printers, saving valuable space and reducing cost.

Features:	Benefits:
Output current per channel ± 20mA (sink/source)	Meets fast switching requirements, driving large loads
HVMOS Technology	Reduces component count, saving space and cost
Data speed 8MHz	Produces high processing speed
Low power level shifting	Reduces power consumption
Data out pin for cascading devices	Simplifies control logic for multiple chip usage



011311

## High Voltage 8-Channel Serial to parallel Converters

### Ordering Information / Availability

<u>Part Number</u>	<u>Package Option</u>	<u>Samples</u>	<u>Lead Time</u>
HV513WG-G	24-Lead SOW (Green)	Now	4-5 Weeks ARO
HV514WG-G	20-Lead SOW (Green)	Now	4-5 Weeks ARO

-G indicates the part is RoHS compliant (Green).



### Product Contact

For any questions regarding the HV513 or the HV514, please contact your local area Supertex sales office, or contact the main office in the US at:

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