



Intel Atom® Processor E3845

2M Cache, 1.91 GHz

Specifications

Product Images

Ordering and Compliance

Ordering and spec information

Intel Atom® Processor E3845 (2M Cache, 1.91 GHz) FC-BGA13F, Tray

Spec Code	SR1X6
Ordering Code	FH8065301487717
Step	D0
RCP	\$52.00

Intel Atom® Processor E3845 (2M Cache, 1.91 GHz) FC-BGA13F, Tray

Spec Code	SR3UT
Ordering Code	FH8065301487717
Step	D1
RCP	\$52.00

Retired and discontinued

Intel Atom® Processor E3845 (2M Cache, 1.91 GHz) FC-BGA13F, Tray

Spec Code	SR1RE
Ordering Code	FH8065301487715
Step	B3

Trade compliance information

ECCN	5A992CN3
CCATS	G143235
US HTS	8542310001

PCN/MDDS Information

SR1X6

935332

[PCN](#) | [MDDS](#)**SR3UT**

962762

[MDDS](#)**SR1RE**

932052

[PCN](#) | [MDDS](#)

Downloads and Software

All information provided is subject to change at any time, without notice. Intel may make changes to manufacturing life cycle, specifications, and product descriptions at any time, without notice. The information herein is provided "as-is" and Intel does not make any representations or warranties whatsoever regarding accuracy of the information, nor on the product features, availability, functionality, or compatibility of the products listed. Please contact system vendor for more information on specific products or systems.

Intel classifications are for informational purposes only and consist of Export Control Classification Numbers (ECCN) and Harmonized Tariff Schedule (HTS) numbers. Any use made of Intel classifications are without recourse to Intel and shall not be construed as a representation or warranty regarding the proper ECCN or HTS. Your company as an importer and/or exporter is responsible for determining the correct classification of your transaction.

Refer to Datasheet for formal definitions of product properties and features.

"Announced" SKUs are not yet available. Please refer to the Launch Date for market availability.

Some products can support AES New Instructions with a Processor Configuration update, in particular, i7-2630QM/i7-2635QM, i7-2670QM/i7-2675QM, i5-2430M/i5-2435M, i5-2410M/i5-2415M. Please contact OEM for the BIOS that includes the latest Processor configuration update.

‡ This feature may not be available on all computing systems. Please check with the system vendor to determine if your system delivers this feature, or reference the system specifications (motherboard, processor, chipset, power supply, HDD, graphics controller, memory, BIOS, drivers, virtual machine monitor-VMM, platform software, and/or operating system) for feature compatibility. Functionality, performance, and other benefits of this feature may vary depending on system configuration.

See <http://www.intel.com/content/www/us/en/architecture-and-technology/hyper-threading/hyper-threading-technology.html?wapkw=hyper+threading> for more information including details on which processors support Intel® HT Technology.

Max Turbo Frequency refers to the maximum single-core processor frequency that can be achieved with Intel® Turbo Boost Technology. See www.intel.com/technology/turboboost/ for more information.

The Recommended Customer Price ("RCP") is pricing guidance for Intel products. Prices are for direct Intel customers, typically represent 1,000-unit purchase quantities, and are subject to change without notice. Taxes and shipping, etc. not included. Prices may vary for other package types and shipment quantities, and special promotional arrangements may apply. If sold in bulk, price represents individual unit. Listing of these RCP does not constitute a formal pricing offer from Intel. Please work with your appropriate Intel representative to obtain a formal price quotation.

System and Maximum TDP is based on worst case scenarios. Actual TDP may be lower if not all I/Os for chipsets are used.

Low Halogen: Applies only to brominated and chlorinated flame retardants (BFRs/CFRs) and PVC in the final product. Intel components as well as purchased components on the finished assembly meet JS-709 requirements, and the PCB / substrate meet IEC 61249-2-21 requirements. The replacement of halogenated flame retardants and/or PVC may not be better for the environment.

For benchmarking data see <http://www.intel.com/performance>.

Intel processor numbers are not a measure of performance. Processor numbers differentiate features within each processor family, not across different processor families. See <http://www.intel.com/content/www/us/en/processors/processor-numbers.html> for details.

Processors that support 64-bit computing on Intel® architecture require an Intel 64 architecture-enabled BIOS.



Intel Atom® Processor E3845

2M Cache, 1.91 GHz

Add to Compare

Specifications

- Essentials
- Performance
- Supplemental Information
- Memory Specifications
- Processor Graphics
- Expansion Options
- I/O Specifications
- Package Specifications
- Advanced Technologies
- Security & Reliability

Ordering and Compliance

Product Images

Downloads and Software

Essentials

Export specifications

Product Collection	Intel® Atom™ Processor E Series
Code Name	Products formerly Bay Trail
Vertical Segment	Embedded
Processor Number	E3845
Status	Launched
Launch Date [?]	Q4'13
Lithography [?]	22 nm
Recommended Customer Price [?]	\$52.00
Use Conditions [?]	Automotive, Industrial Commercial Temp, Industrial Extended Temp, Embedded Broad Market Commercial Temp

Performance

# of Cores [?]	4
# of Threads [?]	4
Processor Base Frequency [?]	1.91 GHz
Cache [?]	2 MB L2
TDP [?]	10W

Supplemental Information

Embedded Options Available [?]	Yes
Datasheet	View now

Memory Specifications

Max Memory Size (dependent on memory type) [?]	8 GB
Memory Types [?]	DDR3L 1333
Max # of Memory Channels [?]	2
ECC Memory Supported [?]	Yes

Processor Graphics

Processor Graphics [?]	Intel® HD Graphics for Intel Atom® Processor Z3700 Series
Graphics Base Frequency [?]	542 MHz
Graphics Burst Frequency	792 MHz
Intel® Quick Sync Video [?]	Yes
# of Displays Supported [?]	2

Expansion Options

PCI Express Revision [?]	2.0
PCI Express Configurations [?]	x4, x2, x1
Max # of PCI Express Lanes [?]	4

I/O Specifications

USB Revision [?]	2.0, 3.0
Total # of SATA Ports [?]	2
Integrated LAN [?]	No
Integrated IDE [?]	No
UART	Yes

Package Specifications

Sockets Supported [?]	FCBGA1170
T _{JUNCTION} [?]	-40°C to 110°C
Package Size	25mm x 27mm
Low Halogen Options Available	See MDDS

Advanced Technologies

Intel® vPro™ Technology [?]	No
Intel® Hyper-Threading Technology [?]	No
Intel® Virtualization Technology (VT-x) [?]	Yes
Intel® Virtualization Technology for Directed I/O (VT-d) [?]	No
Intel® VT-x with Extended Page Tables (EPT) [?]	Yes
Intel® 64 [?]	Yes
Instruction Set [?]	64-bit
Enhanced Intel SpeedStep® Technology [?]	Yes
Intel® HD Audio Technology [?]	Yes

Security & Reliability

Intel® AES New Instructions [?]	Yes
Intel® Trusted Execution Technology [?]	No
Execute Disable Bit [?]	Yes

More support options for Intel Atom® Processor E3845 (2M Cache, 1.91 GHz)



Product Support



Downloads and Software



Support Community



Warranty and Replacement



Need more help?

Contact support

Give Feedback

All information provided is subject to change at any time, without notice. Intel may make changes to manufacturing life cycle, specifications, and product descriptions at any time, without notice. The information herein is provided "as-is" and Intel does not make any representations or warranties whatsoever regarding accuracy of the information, nor on the product features, availability, functionality, or compatibility of the products listed. Please contact system vendor for more information on specific products or systems.

Intel classifications are for informational purposes only and consist of Export Control Classification Numbers (ECCN) and Harmonized Tariff Schedule (HTS) numbers. Any use made of Intel classifications are without recourse to Intel and shall not be construed as a representation or warranty regarding the proper ECCN or HTS. Your company as an importer and/or exporter is responsible for determining the correct classification of your transaction.

Refer to Datasheet for formal definitions of product properties and features.

*Announced SKUs are not yet available. Please refer to the Launch Date for market availability.

Some products can support AES New Instructions with a Processor Configuration update, in particular, i7-2630QM/i7-2635QM, i7-2670QM/i7-2675QM, i5-2430M/i5-2435M, i5-2410M/i5-2415M. Please contact OEM for the BIOS that includes the latest Processor configuration update.

† This feature may not be available on all computing systems. Please check with the system vendor to determine if your system delivers this feature, or reference the system specifications (motherboard, processor, chipset, power supply, HDD, graphics controller, memory, BIOS, drivers, virtual machine monitor-VMM, platform software, and/or operating system) for feature compatibility. Functionality, performance, and other benefits of this feature may vary depending on system configuration.

See <http://www.intel.com/content/www/us/en/architecture-and-technology/hyper-threading/hyper-threading-technology.html#wpkw=hyper+threading> for more information including details on which processors support Intel® HT Technology.

Max Turbo Frequency refers to the maximum single-core processor frequency that can be achieved with Intel® Turbo Boost Technology. See www.intel.com/technology/turboboost/ for more information.

The Recommended Customer Price ("RCP") is pricing guidance for Intel products. Prices are for direct Intel customers, typically represent 1,000-unit purchase quantities, and are subject to change without notice. Taxes and shipping, etc. not included. Prices may vary for other package types and shipment quantities, and special promotional arrangements may apply. If sold in bulk, price represents individual unit. Listing of these RCP does not constitute a formal pricing offer from Intel. Please work with your appropriate Intel representative to obtain a formal price quotation.

System and Maximum TDP is based on worst case scenarios. Actual TDP may be lower if not all I/Os for chipsets are used.

Low Halogen: Applies only to brominated and chlorinated flame retardants (BFRs/CFRs) and PVC in the final product. Intel components as well as purchased components on the finished assembly meet JS-709 requirements, and the PCB substrate meet IEC 61249-2-21 requirements. The replacement of halogenated flame retardants and/or PVC may not be better for the environment.

For benchmarking data see <http://www.intel.com/performance>.

Intel processor numbers are not a measure of performance. Processor numbers differentiate features within each processor family, not across different processor families. See <http://www.intel.com/content/www/us/en/processors/processor-numbers.html> for details.

Processors that support 64-bit computing on Intel® architecture require an Intel 64 architecture-enabled BIOS.

