Introduction
System designers continue to adopt Atmel® DataFlash® as the preferred nonvolatile memory device in their systems to store program code, user data, and parametric information. The DataFlash reduces total system cost and complexity through a feature-rich granular page-erase-based architecture, utilizing on-board SRAM buffers, and a comprehensive set of flexible command codes resulting in a reduced software footprint. The small pages and on-chip buffers facilitate easier changes to the memory contents and eliminate the large external RAM devices required to buffer the large data blocks during device reprogramming. The AT45 Series DataFlash devices feature a user configurable page size and in many data centric applications the default page size is optimal. However in code centric applications, the binary page size may be considered more efficient.

DataFlash Page Size Options
The page size and corresponding factory default configuration for each device are shown below. The mechanism to switch to the binary page size is detailed in each device datasheet available in the DataFlash products section on the Atmel web site. In order to simplify the customers production flow, Atmel has added an option for customers to order selected DataFlash devices pre-configured with a Binary page size.

<table>
<thead>
<tr>
<th>Device</th>
<th>Density (Mbits)</th>
<th>Page Size (Bytes)</th>
</tr>
</thead>
<tbody>
<tr>
<td>AT45DB021D</td>
<td>2</td>
<td>256</td>
</tr>
<tr>
<td>AT45DB041D</td>
<td>4</td>
<td>256</td>
</tr>
<tr>
<td>AT45DB081D</td>
<td>8</td>
<td>256</td>
</tr>
<tr>
<td>AT45DB161D</td>
<td>16</td>
<td>512</td>
</tr>
<tr>
<td>AT45DB321D</td>
<td>32</td>
<td>512</td>
</tr>
<tr>
<td>AT45DB642D</td>
<td>64</td>
<td>1024</td>
</tr>
</tbody>
</table>
How to Order DataFlash Devices with a Factory Configured Binary Page Size

The diagram below details the correct ordering codes required to specify products configured with the Binary Page size.

AT45DB041D – SSU SL954

**Atmel Designator**

**Product Family**

45DB = DataFlash Series

**Device Density**

041 = 4-Mbit
081 = 8-Mbit
161 = 16-Mbit
321 = 32-Mbit
642 = 64-Mbit

**Device Revision**

**Page Configuration**

Blank = Default Page Size
SL954 = Binary Page Bulk Delivery
SL955 = Binary Page T&R Delivery

**Device Grade**

U = Standard Tin Plate Lead Finish
Industrial Temp -40°C to +85°C
RoHS/Green Compliant

**Package Option**

M = 8MA1, 8-pad, 6 x 5 x 0.6 mm UDFN
8M1-A, 8-pad, 6 x 5 x 1.0 mm MLF
MW = 8MW, 8-pad, 5 x 6 x 1.0 mm MLF
SS = 8S1, 8-lead, 0.150" wide SOIC
S = 8S2, 8-lead, 0.208" wide SOIC
T = 28T, 28-lead, 8 x 13.4 mm TSOP
CNU = 8CN3, 8-pad, 6 x 8.0 mm CASON

**Notes**

SL954 specifies the option of a Binary Page size with Bulk (Tube/Tray) delivery, SL955 specifies the option of a Binary Page size with Tape and Reel (T&R) delivery.

**Exceptions**

The 1-Mbit DataFlash device is not available to order with the factory configured binary page size option. The user can still select the binary page option as detailed in the device specification.

**Device Identification**

SL954 will be marked on the topside of each device irrespective of shipping method to differentiate the factory configured binary page size devices from standard devices with the default page size.

**Further Information**

Specifications, applications notes and further information for Atmel DataFlash products can be found @ http://www.atmel.com/products/DataFlash

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**Product Contact**

**Product Line**
dataflash@atmel.com

**Literature Requests**
www.atmel.com/literature

**Web Site**
www.atmel.com

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