



## Product Change Notification / SYST-02AMFX809

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### Date:

03-May-2024

### Product Category:

8-Bit Microcontrollers

### PCN Type:

Document Change

### Notification Subject:

ATmega48A/PA/88A/PA/168A/PA/328/P Silicon Errata and Data Sheet Clarification

### Affected CPNs:

[SYST-02AMFX809\\_Affected\\_CPN\\_05032024.pdf](#)

[SYST-02AMFX809\\_Affected\\_CPN\\_05032024.csv](#)

### Notification Text:

SYST-02AMFX809

Microchip has released a new Document for the ATmega48A/PA/88A/PA/168A/PA/328/P Silicon Errata and Data Sheet Clarification of devices. If you are using one of these devices please read the document located at [ATmega48A/PA/88A/PA/168A/PA/328/P Silicon Errata and Data Sheet Clarification](#).

**Notification Status:** Final

#### Description of Change:

- Document:
  - Editorial updates
- Added new data sheet clarifications:
  - System Clock and Clock Options:
    - 3.1.1. Low-Power Crystal Oscillator
    - 3.1.2. Full Swing Crystal Oscillator
    - 3.1.3. Low-Frequency Crystal Oscillator
    - 3.1.4. Calibrated Internal RC Oscillator
    - 3.1.5. 128 kHz Internal Oscillator
    - 3.1.6. External Clock

**Impacts to Data Sheet:** None

**Reason for Change:** To Improve Productivity

**Change Implementation Status:** Complete

**Date Document Changes Effective:** 03 May 2024

**NOTE:** Please be advised that this is a change to the document only the product has not been changed.

**Markings to Distinguish Revised from Unrevised Devices:** N/A

## Attachments:

[ATmega48A/PA/88A/PA/168A/PA/328/P Silicon Errata and Data Sheet Clarification](#)

Please contact your local [Microchip sales office](#) with questions or concerns regarding this notification.

## Terms and Conditions:

If you wish to receive Microchip PCNs via email please register for our PCN email service at our [PCN home page](#) select register then fill in the required fields. You will find instructions about registering for Microchips PCN email service in the [PCN FAQ](#) section.

If you wish to change your PCN profile, including opt out, please go to the [PCN home page](#) select login and sign into your myMicrochip account. Select a profile option from the left navigation bar and make the applicable selections.

Affected Catalog Part Numbers (CPN)

ATMEGA168A-AU  
ATMEGA168A-AUR  
ATMEGA168A-MMH  
ATMEGA168A-MMHR  
ATMEGA168A-MU  
ATMEGA168A-MUR  
ATMEGA168A-PU  
ATMEGA168PA-AN  
ATMEGA168PA-ANR  
ATMEGA168PA-AU  
ATMEGA168PA-AUR  
ATMEGA168PA-MMH  
ATMEGA168PA-MMHR  
ATMEGA168PA-MN  
ATMEGA168PA-MNR  
ATMEGA168PA-MU  
ATMEGA168PA-MUR  
ATMEGA168PA-MURA2  
ATMEGA168PA-PN  
ATMEGA168PA-PU  
ATMEGA328-AU  
ATMEGA328-AUR  
ATMEGA328-MMH  
ATMEGA328-MMHR  
ATMEGA328-MU  
ATMEGA328-MUR  
ATMEGA328-PU  
ATMEGA328P-AN  
ATMEGA328P-ANR  
ATMEGA328P-AU  
ATMEGA328P-AUR  
ATMEGA328P-MMH  
ATMEGA328P-MMHR  
ATMEGA328P-MN  
ATMEGA328P-MNR  
ATMEGA328P-MU  
ATMEGA328P-MUA2  
ATMEGA328P-MUR  
ATMEGA328P-PN  
ATMEGA328P-PU  
ATMEGA48A-AU  
ATMEGA48A-AUR  
ATMEGA48A-MMH  
ATMEGA48A-MMHR  
ATMEGA48A-MU  
ATMEGA48A-MUR

ATMEGA48A-PU  
ATMEGA48PA-15AZ  
ATMEGA48PA-15MZ  
ATMEGA48PA-AN  
ATMEGA48PA-ANR  
ATMEGA48PA-AU  
ATMEGA48PA-AUR  
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ATMEGA88PA-ANR  
ATMEGA88PA-AU  
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ATMEGA88PA-AURA3  
ATMEGA88PA-MMH  
ATMEGA88PA-MMHR  
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ATMEGA88PA-MURA6  
ATMEGA88PA-PN  
ATMEGA88PA-PU