

## Access to Memory (AtoM) - Bug #11387

### AtoM is not compatible with recent versions of APCu

07/27/2017 09:02 AM - Dan Gillean

<b>Status:</b>	Verified	<b>Start date:</b>	07/27/2017
<b>Priority:</b>	Medium	<b>Due date:</b>	
<b>Assignee:</b>	Mike Cantelon	<b>% Done:</b>	0%
<b>Category:</b>	Installation	<b>Estimated time:</b>	0.00 hour
<b>Target version:</b>	Release 2.4.1	<b>Tested version:</b>	2.4
<b>Google Code Legacy ID:</b>		<b>Requires documentation:</b>	Yes
<b>Sponsored:</b>	No		

#### Description

A user has reported an error during installation (Ubuntu 16.04) when trying to install APCu-bc. See:

- [https://groups.google.com/d/msg/ica-atom-users/oeLicN3mttM/1\\_7DfdoJCQAJ](https://groups.google.com/d/msg/ica-atom-users/oeLicN3mttM/1_7DfdoJCQAJ) (2017-07-27)

Our current documentation has users install APCU-bc, which is not packaged by 16.04. This is becoming an issue, as the PECL version throws an error when installed.

Jesus has reproduced this issue, but notes that APCU is still correctly installed, and you can proceed with the installation. However, we should try to resolve this so users aren't continually experiencing errors while trying to install.

The solution would be to upgrade AtoM's cache layer to work with recent versions of APCu.

#### History

##### #1 - 09/07/2017 07:03 PM - Mike Cantelon

- Status changed from New to Code Review
- Assignee set to Nick Wilkinson

PR for CR: <https://github.com/artefactual/atom/pull/614>

##### #2 - 09/07/2017 09:34 PM - Steve Breker

- Status changed from Code Review to Feedback
- Assignee changed from Nick Wilkinson to Mike Cantelon

Looking great but I think there are a few more places that need updating:

plugins/sfInstallPlugin/lib/sfInstall.class.php

There are also `apc_*` calls in the vendor dir in the symfony and symfony2 dirs

##### #3 - 09/08/2017 02:22 PM - Mike Cantelon

Thanks Steve!

Also Jesús's perspective (I emailed to ask him for feedback on changing this):

I don't remember the details but I think what was good about `apcu_bc` was that you always had the same API regardless the version of APCu that the user was running. If you interact directly with APCu you'll see that older releases (e.g. the one bundled in 14.04 I believe) and recent versions have smaller differences in the API which will cause bugs. I may be wrong though, not sure what's the situation at this point.

I'm sorry I can't help more. I would only recommend to be wary about the whole thing and start thinking on all the platforms where we're

recommending users to install AtoM and analyze the different versions of apcu you can find today (e.g. 14.04 still bundling and old version). I think that any support for apc\_\* (old apc extension) can be ditched now because php 5.3 is definitely gone (I believe we don't support more ubuntu 12.04 installations).

**#4 - 09/11/2017 02:25 PM - Mike Cantelon**

- Status changed from *Feedback* to *In progress*

I'm going to email the atom-dev list for feedback on whether we should change this.

**#5 - 09/19/2017 03:09 PM - Mike Cantelon**

- Assignee changed from *Mike Cantelon* to *Steve Breker*

Updated for another round of code review. I created an APUC-friendly version of ApcUniversalClassLoader. sflnInstaller doesn't need to be updated as it looks for APC alternate functions present in PHP 5.5+ before trying to use old APC functions. I didn't update the Symfony Doctrine stuff to APCu as we don't use it.

**#6 - 09/19/2017 03:09 PM - Mike Cantelon**

- Status changed from *In progress* to *Code Review*

**#7 - 09/20/2017 09:48 AM - Steve Breker**

- Status changed from *Code Review* to *Feedback*

- Assignee changed from *Steve Breker* to *Mike Cantelon*

Hi Mike - are you sure that sflnInstall does not need to be updated? There is not an 'else' on that if - both opcache and apc cache are cleared in succession - these are two different caches I believe?

**#8 - 09/20/2017 01:53 PM - Mike Cantelon**

Hi Steve... running the APC clears should be fine if they are defined (the APC used to include the opcache cache). I'll make those use elses too though as it's cleaner that way.

**#9 - 09/20/2017 01:59 PM - Mike Cantelon**

- Status changed from *Feedback* to *Code Review*

- Assignee changed from *Mike Cantelon* to *Steve Breker*

OK, made that tweak to sflnInstall.

**#10 - 09/20/2017 02:04 PM - Mike Cantelon**

- Assignee changed from *Steve Breker* to *Mike Cantelon*

Actually I'm going to get rid of the APC calls entirely.

**#11 - 09/20/2017 02:06 PM - Mike Cantelon**

- Assignee changed from *Mike Cantelon* to *Steve Breker*

(OK, done.)

**#12 - 09/20/2017 02:57 PM - Steve Breker**

- Status changed from Code Review to Feedback
- Assignee changed from Steve Breker to Mike Cantelon

Looks good Mike. Thanks for addressing those additional APC calls.

**#13 - 09/20/2017 03:23 PM - Mike Cantelon**

- Status changed from Feedback to QA/Review
- Assignee changed from Mike Cantelon to Nick Wilkinson

Hi Nick. I'm not sure how/who best to QA this.

**#14 - 09/21/2017 11:35 AM - Steve Breker**

CR <https://github.com/artefactual/atom/pull/622>

Looks good.

**#15 - 09/22/2017 09:04 AM - Nick Wilkinson**

- Assignee changed from Nick Wilkinson to Mike Cantelon

Hey Mike, to QA this, can you try reproducing the original error reported by the user (outlined in the issue description)?

**#16 - 10/19/2017 02:31 AM - Mike Cantelon**

- Status changed from QA/Review to Verified

Hi Nick... I tried to reproduce the error and did get an error, but different error text. They got "Illegal instruction (core dumped)" and I got "Segmentation fault (core dumped)". I'm running Ubuntu 16.04.3 Server (maybe the user was running a slightly different 16.04 version).

I also verified that the caching works on a fresh installation. I tested this by creating a qa/2.5.x installation from scratch, using the 2.4 instructions (but without attempting to install apcu-bc) then upgrading Elasticsearch to work with 2.5 and installing apcu (with apt-get install php-apcu) and encountered no issues.

I've marked this as verified (but can re-open if there are any other ideas for testing).

**#17 - 08/16/2018 08:44 AM - Dan Gillean**

- Assignee deleted (Mike Cantelon)
- Target version set to Release 2.4.1

**#18 - 08/16/2018 08:46 AM - Dan Gillean**

- Assignee set to Mike Cantelon

Reminder to developers to update the documentation for installation in the 2.5 Admin manual - and possibly 2.4 as well, since this went into qa/2.4.x just after the 2.4.0 release?

**#19 - 08/16/2018 08:56 AM - Dan Gillean**

See also this related forum thread - user having issues with APCU-bc install.

**#20 - 04/02/2019 04:43 PM - Santiago Collazo**

When using php 7.2 (Ubuntu 18.04 or Centos 7), the apcu\_bc extension is not only not needed, but also breaks atom. We should update the install instructions in order to add the following packages:

- Ubuntu 18.04: php-apcu
- Centos 7: rh-php72-php-pecl-apcu

Also, in the atom25-1604 vm, apcu\_bc doesn't seem installed, so I think we should remove the paragraph from the install instructions.