

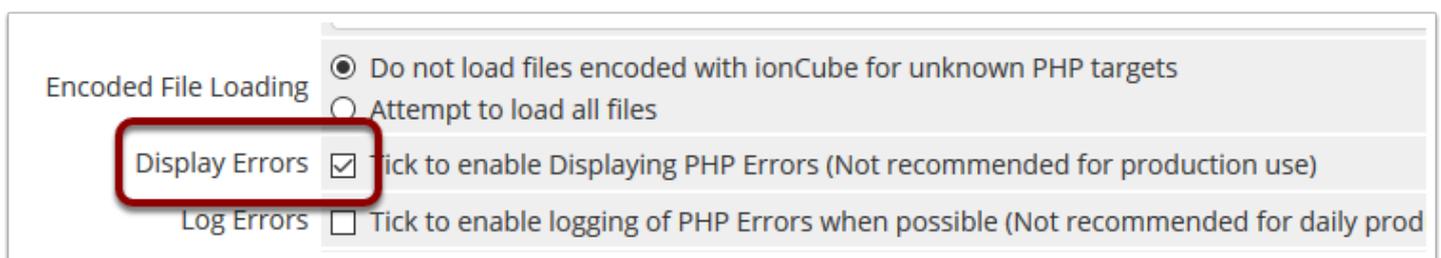
# Advanced Cron Troubleshooting

If you have determined that the cron job is not completing in [the previous article](#) and are familiar with using the server's Command Line Interface (SSH), this guide shows how to identify the cause.

The cron.php script contains a number of options which can be called most easily via the server's command line, one of which increases the verbosity of the output. This can be helpful in identifying any errors which might be occurring.

First, access your WHMCS Admin area. Then, go to **Configuration > System Settings > General Settings > Other**, or **Setup > General Settings > Other** for WHMCS 7.10 and earlier.

Check **Display Errors** and then click **Save Changes**.



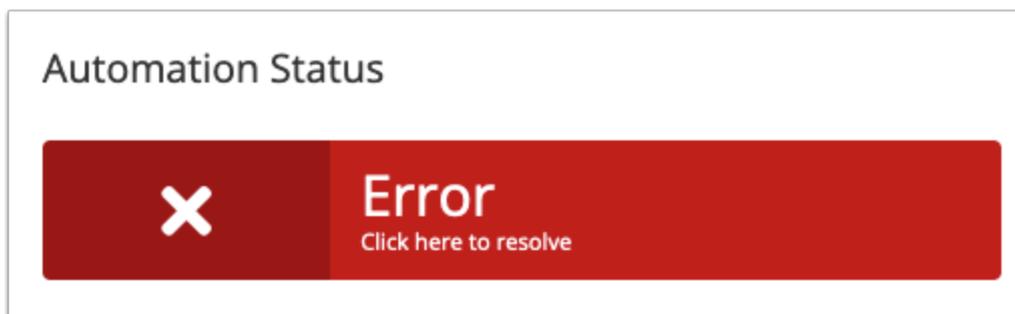
Encoded File Loading  Do not load files encoded with ionCube for unknown PHP targets  
 Attempt to load all files

**Display Errors**  Tick to enable Displaying PHP Errors (Not recommended for production use)

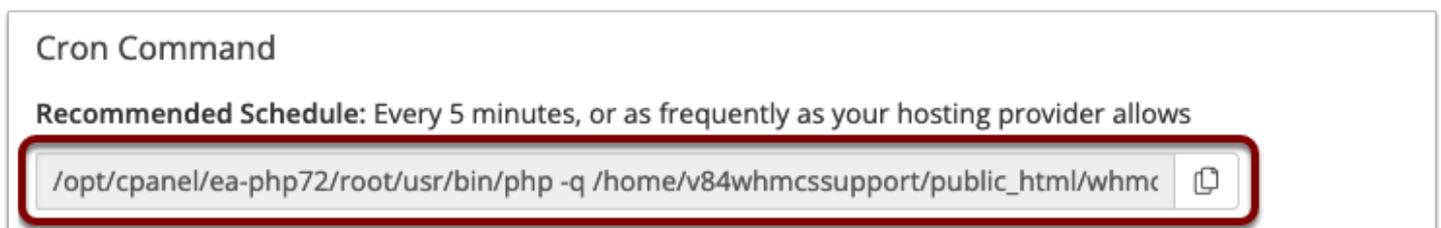
Log Errors  Tick to enable logging of PHP Errors when possible (Not recommended for daily prod

Next, navigate to **Configuration > System Settings > Automation Settings (Setup > Automation Settings** for WHMCS 7.10 and earlier).

Click on the Cron Status badge:



In the modal which appears, copy the **Cron Command** :

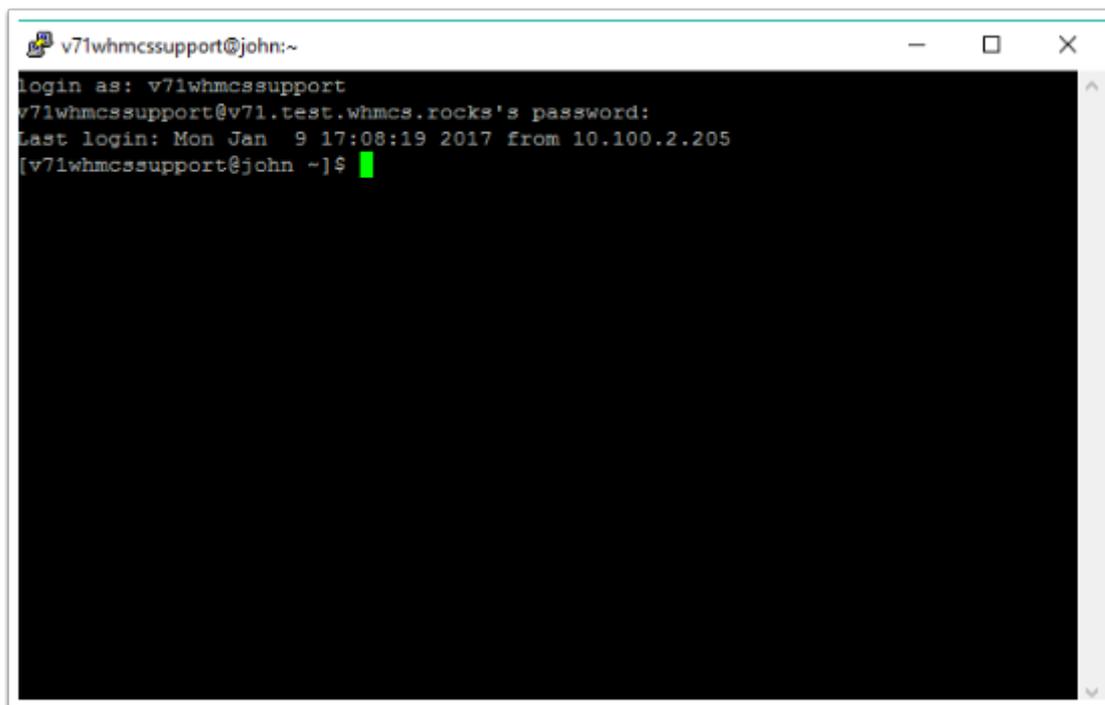


Cron Command

Recommended Schedule: Every 5 minutes, or as frequently as your hosting provider allows

`/opt/cpanel/ea-php72/root/usr/bin/php -q /home/v84whmcssupport/public_html/whmc` 

Access your server's Command Line Interface:

A terminal window titled 'v71whmcssupport@john:~' with standard window controls. The terminal output shows a successful login for the user 'v71whmcssupport' on the host 'v71.test.whmcs.rocks'. The last login was on 'Mon Jan 9 17:08:19 2017 from 10.100.2.205'. The prompt is '[v71whmcssupport@john ~]\$' with a green cursor.

Paste the **Cron Command** into the Command Line Interface. At the end of the command, add the following command and options:

```
all -F -vvv
```

 Click to copy

The *all* command will execute all the tasks.

The *-F* option forces all the tasks to be executed, even if some of the daily tasks have already been performed today

The *-vvv* option sets the output verbosity level to maximum, meaning everything which can be output will be output.

You should now be ready to execute a command similar to:

```
php -q /home/v71whmcssupport/public_html/whmcs/crons/cron.php all -F -vvv
```

 Click to copy

```
v71whmcssupport@john:~  
login as: v71whmcssupport  
v71whmcssupport@v71.test.whmcs.rocks's password:  
Last login: Mon Jan 9 17:08:19 2017 from 10.100.2.205  
[v71whmcssupport@john ~]$ php -q /home/v71whmcssupport/public_html/whmcs/crons/cron.php all -F -vvv
```

Press Enter to execute the command.

On screen you will see the cron.php script progress through all 24 tasks and return a green *[OK] Completed* message at the end.

```
2/24 [██████████] 8% < 1 sec/< 1 sec 24.0 MiB  
Invoices  
3/24 [██████████] 12% < 1 sec/< 1 sec 24.0 MiB  
Late Fees  
4/24 [██████████] 16% < 1 sec/< 1 sec 24.0 MiB  
Credit Card Charges  
5/24 [██████████] 20% < 1 sec/< 1 sec 24.0 MiB  
Invoice & Overdue Reminders  
6/24 [██████████] 25% 1 sec/4 secs 38.0 MiB  
Domain Renewal Notices  
7/24 [██████████] 29% 1 sec/3 secs 38.0 MiB  
Cancellation Requests  
8/24 [██████████] 33% 1 sec/3 secs 38.0 MiB  
Overdue Suspensions  
9/24 [██████████] 37% 4 mins/11 mins 40.0 MiB  
Overdue Terminations  
10/24 [██████████] 41% 4 mins/10 mins 40.0 MiB  
Fixed Term Terminations  
11/24 [██████████] 45% 4 mins/9 mins 40.0 MiB  
Inactive Tickets  
12/24 [██████████] 50% 4 mins/8 mins 40.0 MiB  
Delayed Affiliate Commissions  
13/24 [██████████] 54% 4 mins/7 mins 40.0 MiB  
Affiliate Reports  
14/24 [██████████] 58% 4 mins/7 mins 40.0 MiB  
Email Marketer Rules  
15/24 [██████████] 62% 4 mins/6 mins 42.0 MiB  
Credit Card Expiry Notices  
16/24 [██████████] 66% 4 mins/6 mins 42.0 MiB  
Server Usage Stats  
17/24 [██████████] 70% 4 mins/6 mins 42.0 MiB  
Overage Billing Charges  
18/24 [██████████] 75% 4 mins/6 mins 42.0 MiB  
Client Status Update  
19/24 [██████████] 79% 4 mins/5 mins 42.0 MiB  
Domain Expiry  
20/24 [██████████] 83% 4 mins/5 mins 42.0 MiB  
Ticket Escalation Rules  
21/24 [██████████] 87% 4 mins/5 mins 42.0 MiB  
Data Retention Pruning  
22/24 [██████████] 91% 4 mins/5 mins 42.0 MiB  
WHMCS Updates  
23/24 [██████████] 95% 4 mins/4 mins 46.0 MiB  
Run Jobs Queue  
24/24 [██████████] 100% 4 mins/4 mins 46.0 MiB  
  
Sending Daily Cron Digest email  
Executing System Queue  
-----  
4/4 [██████████] 100% 10 secs/10 secs 92.0 MiB  
  
[OK] Completed
```

The above screenshot shows a successful execution.

Any errors which might be output on-screen can be used to identify the cause of the cron not completing.

Explanations of common errors are [available in our documentation](#). For help with cron frequency errors, see [Resolving a Cron Invocation Frequency Warning](#).

WHMCS technical support can advise on the solution to errors which you may encounter, please include the full output when opening a support ticket.

 If a successful execution is completed at the command line without any errors, continue to the [Advanced Cron Troubleshooting - Intermittent Issues](#) article for further troubleshooting steps.