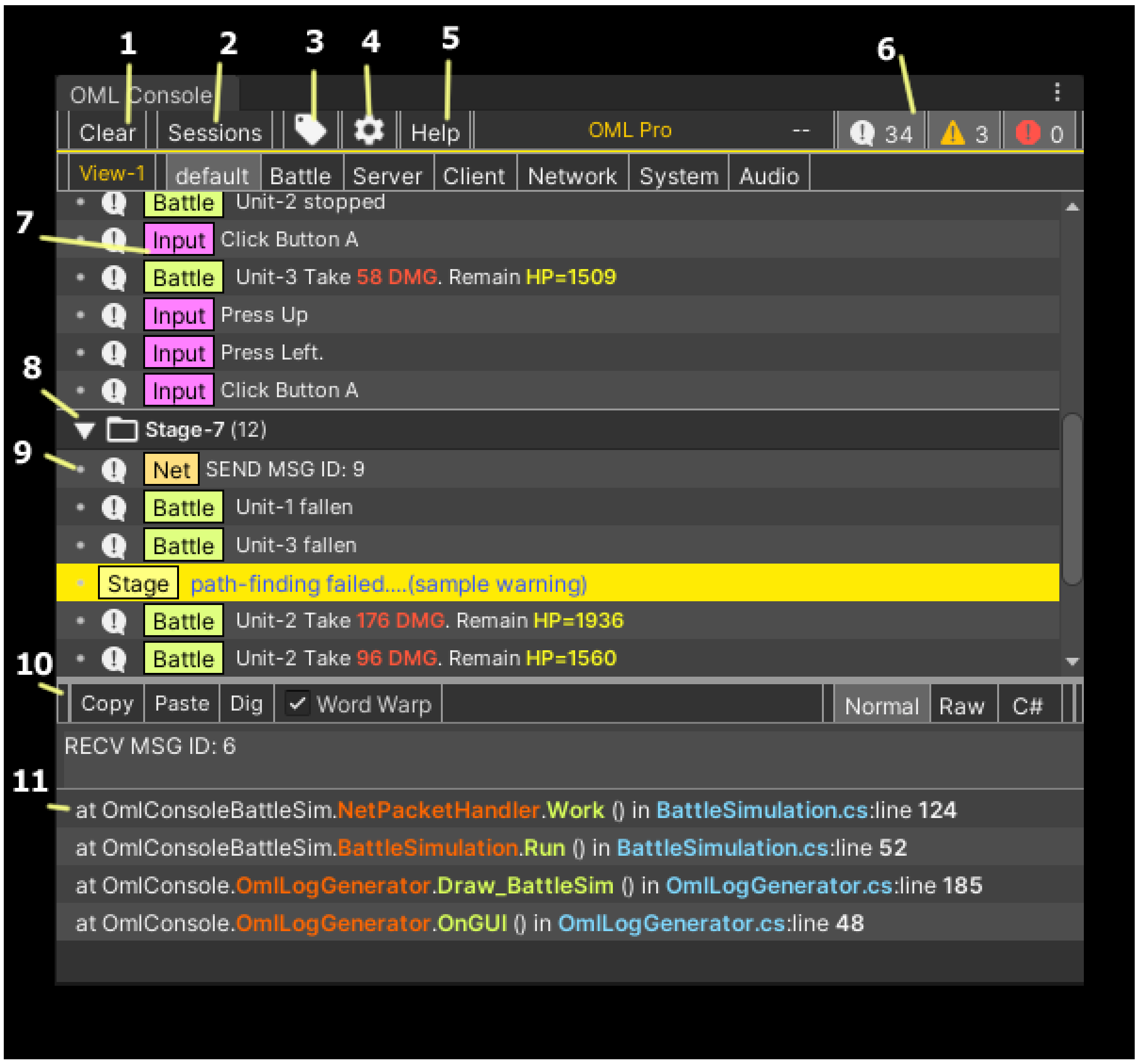
OML Console Pro User Guide

Introduction

OML Console is a professional log viewer with advanced filtering features and neat visual design to allow you to read logs in a much more enjoyable way.

User Interface Basics

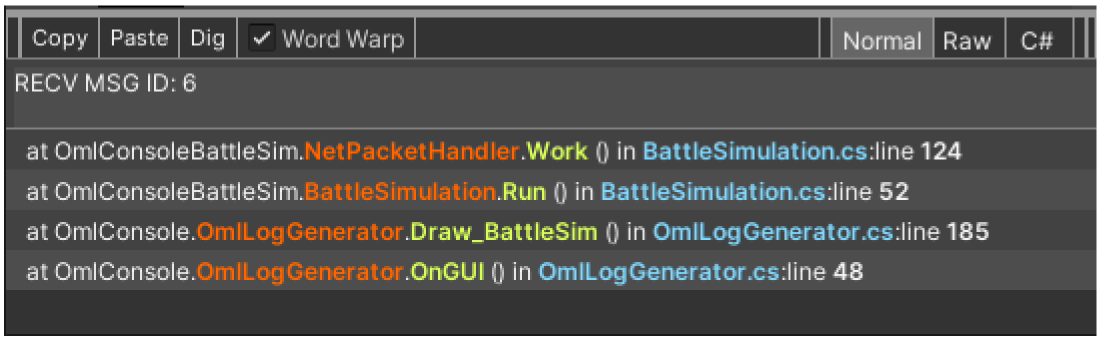
1. Press to clear the current logs.
2. Press to toggle **session view mode** which will hide all logs for quicker navigation.
3. Press to open the **tag** panel.
4. Press to open the **setting** panel.
5. Press to show **Quick Help** about OML basics.
6. Display statistics about current logs.
7. Tags assigned to a log.
8. The beginning of a foldable session. (**PRO Version only**)
9. A clickable dot denotes a session the current log belongs to.(**PRO Version only**)
10. Call stack window
11. Stack frames of select log



```
Battle  Unit-2 stopped
Input   Click Button A
Battle  Unit-3 Take 58 DMG. Remain HP=1509
Input   Press Up
Input   Press Left.
Input   Click Button A
Stage-7 (12)
Net     SEND MSG ID: 9
Battle  Unit-1 fallen
Battle  Unit-3 fallen
Stage   path-finding failed....(sample warning)
Battle  Unit-2 Take 176 DMG. Remain HP=1936
Battle  Unit-2 Take 96 DMG. Remain HP=1560
```

```
RECV MSG ID: 6

at OmlConsoleBattleSim.NetPacketHandler.Work () in BattleSimulation.cs:line 124
at OmlConsoleBattleSim.BattleSimulation.Run () in BattleSimulation.cs:line 52
at OmlConsole.OmlLogGenerator.Draw_BattleSim () in OmlLogGenerator.cs:line 185
at OmlConsole.OmlLogGenerator.OnGUI () in OmlLogGenerator.cs:line 48
```

<u>StackTrace Panel</u>



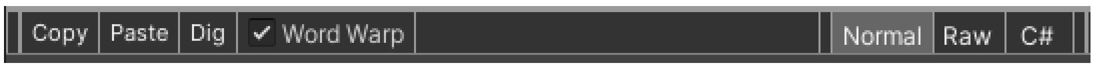
```
RECV MSG ID: 6

at OmlConsoleBattleSim.NetPacketHandler.Work () in BattleSimulation.cs:line 124
at OmlConsoleBattleSim.BattleSimulation.Run () in BattleSimulation.cs:line 52
at OmlConsole.OmlLogGenerator.Draw_BattleSim () in OmlLogGenerator.cs:line 185
at OmlConsole.OmlLogGenerator.OnGUI () in OmlLogGenerator.cs:line 48
```

The CallStack shows you more info about a log. **Double click** on a stacktrace to go to the corresponding source file.

This panel can be opened in embedded mode and standalone mode. Embedded mode can be disabled from the settings.

In standalone mode, it automatically shows the latest selected log from the consoles. It is shared among all opened OML consoles.

To open a standalone panel, click [Tools]->[OML Console]->[Stacktrace Window] from the Unity top main menu.



You can set the stacktrace view's top menu to auto hide or always visible from settings.

On the left, you can

1. Copy the log text with stacktrace to clipboard.
2. Paste text from clipboard to show in this panel.
3. '**Dig**' help you parse stacktrace from message lines.
4. toggle word wrap for the log message.

   e.g. running server/client in the same program. Log with stacktrace sent from server to client. Dig can then resolve stacktrace embedded from server log message.

On the right, you can toggle the display mode.

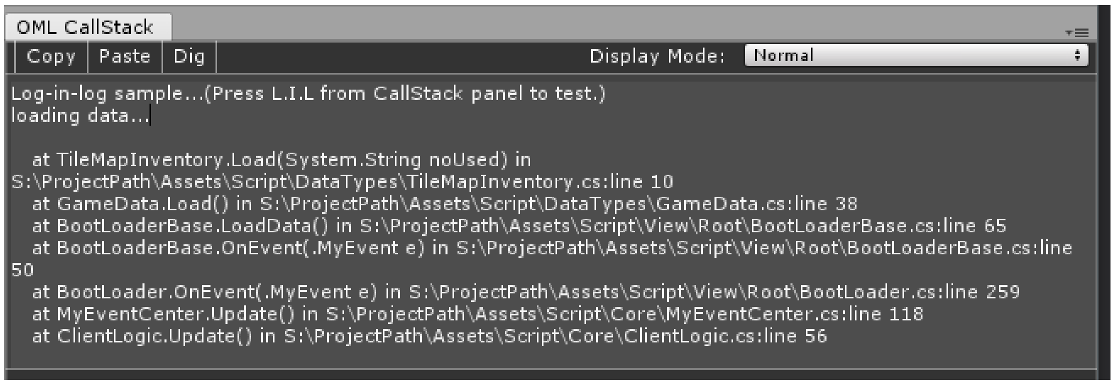
1. Normal - show the normal cleaned up stack-trace.
2. Raw - show the raw content of the stack trace
3. C# - Peek the code lines around the log message being printed.

Example of using Paste and Dig.

Suppose you saved a log to a text file and now want to check that out.
Here is the log message.

```
Log-in-log sample...(Press L.I.L from CallStack panel to test.)
loading data...

   at TileMapInventory.Load(System.String noUsed) in S:\ProjectPath\Assets\Script\DataTypes\TileMapInventory.cs:line
10
  at GameData.Load() in S:\ProjectPath\Assets\Script\DataTypes\GameData.cs:line 38
  at BootLoaderBase.LoadData() in S:\ProjectPath\Assets\Script\View\Root\BootLoaderBase.cs:line 65
  at BootLoaderBase.OnEvent(.MyEvent e) in S:\ProjectPath\Assets\Script\View\Root\BootLoaderBase.cs:line 50
  at BootLoader.OnEvent(.MyEvent e) in S:\ProjectPath\Assets\Script\View\Root\BootLoader.cs:line 259
  at MyEventCenter.Update() in S:\ProjectPath\Assets\Script\Core\MyEventCenter.cs:line 118
  at ClientLogic.Update() in S:\ProjectPath\Assets\Script\Core\ClientLogic.cs:line 56
```

You copy the blue log above and press the [**Paste**] button on stacktrace panel.

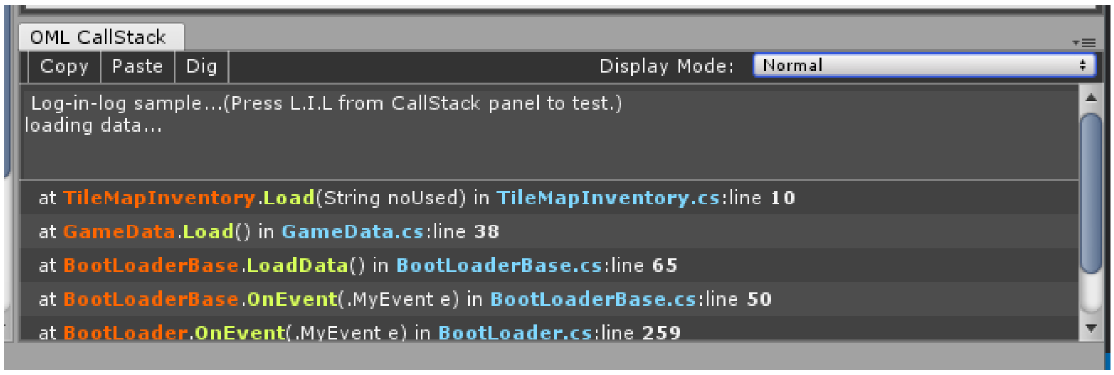


Display Mode: Normal

```
Log-in-log sample...(Press L.I.L from CallStack panel to test.)
loading data...

  at TileMapInventory.Load(System.String noUsed) in
S:\ProjectPath\Assets\Script\DataTypes\TileMapInventory.cs:line 10
  at GameData.Load() in S:\ProjectPath\Assets\Script\DataTypes\GameData.cs:line 38
  at BootLoaderBase.LoadData() in S:\ProjectPath\Assets\Script\View\Root\BootLoaderBase.cs:line 65
  at BootLoaderBase.OnEvent(.MyEvent e) in S:\ProjectPath\Assets\Script\View\Root\BootLoaderBase.cs:line
50
  at BootLoader.OnEvent(.MyEvent e) in S:\ProjectPath\Assets\Script\View\Root\BootLoader.cs:line 259
  at MyEventCenter.Update() in S:\ProjectPath\Assets\Script\Core\MyEventCenter.cs:line 118
  at ClientLogic.Update() in S:\ProjectPath\Assets\Script\Core\ClientLogic.cs:line 56
```

After the “paste” operation. The log is now showing in the CallStack panel.

Press [**Dig**] to ask OML to try to parse the stacks from within the message text for you.



Display Mode: Normal

```
Log-in-log sample...(Press L.I.L from CallStack panel to test.)
loading data...

at TileMapInventory.Load(String noUsed) in TileMapInventory.cs:line 10
at GameData.Load() in GameData.cs:line 38
at BootLoaderBase.LoadData() in BootLoaderBase.cs:line 65
at BootLoaderBase.OnEvent(.MyEvent e) in BootLoaderBase.cs:line 50
at BootLoader.OnEvent(.MyEvent e) in BootLoader.cs:line 259
```

As a result, OML parse the stacktrace and beautify it for you to read.

* In the new OML version, when pasted a log , “dig” operation will be auto performed.

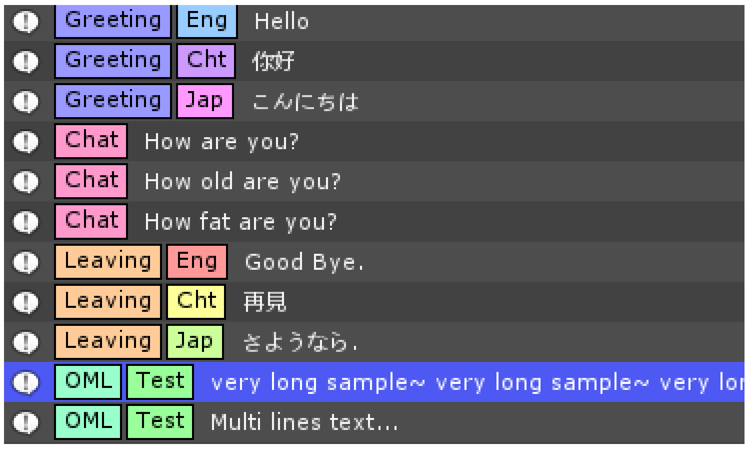
You can quickly go to the source file as usual by double clicking on a stack row (if the log is from the same project).

About Tagging

Tagging is one of the big topics of the OML console. Once a log is tagged, you can do amazing things with it. Tagging not only immediately lets you know what the message is about, it also helps you do group-based filtering as easy as just on key press or click.

There are three different ways to tag your log messages.

1. by the message itself (embeded),
2. by the caller class
3. by caller object instance.



```
Greeting Eng  Hello
Greeting Cht  你好
Greeting Jap  こんにちは
Chat  How are you?
Chat  How old are you?
Chat  How fat are you?
Leaving Eng  Good Bye.
Leaving Cht  再見
Leaving Jap  さようなら.
OML Test  very long sample~ very long sample~ very lo
OML Test  Multi lines text...
```

1. Tag by message

Log message can be in the following format to let OML tag it:

```
[<tag1>,<tag2>,...#<channel>] <log_message>
```

where ,<tag2>... and #<channel> are optional if all you want is a simple tag.

Logging with tag examples:

1. a simple log with not tag.

```
Debug.Log("start ABC.ogg");
```

2. tag the log with 'Audio

```
Debug.Log("[Audio] start ABC.ogg");
```

3. tag the log with 2 tags 'System' and 'Audio'

```
Debug.Log("[System,Audio] start ABC.ogg");
```

4. log to channel 1. (Other channels won't show this log)

```
Debug.Log("[Unit,Data#1] A take 10 DMG.");
```

5. Channels are useful for filtering if some logical units print out similar logs

```
Debug.Log("[Unit,Data#2] B take 5 DMG.", ".");
```

6. Log to channel 3 with out any tag

```
Debug.Log("[#3] server is shutting down...");
```

2. Tag by caller class

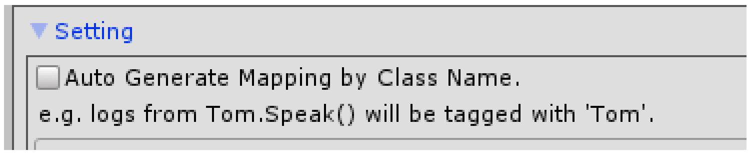
Besides manually tagging a message, you can also let OML auto tag for you and help you keep your log message clean!

Note: in the recent version, an option is added to the auto display class label when no tag is present in a message. Class labels allow zoom-in mode just like with tag. Unless you need to assign those messages to Tag Group, it is not needed to use auto tag anymore for simple filtering.

How it works:

Each log you normally see is created at some point in your program with a caller that calls the log function. E.g. Debug.Log(), Debug.LogWarning(), etc. We can make use of this info to let OML auto tag your logs for you!

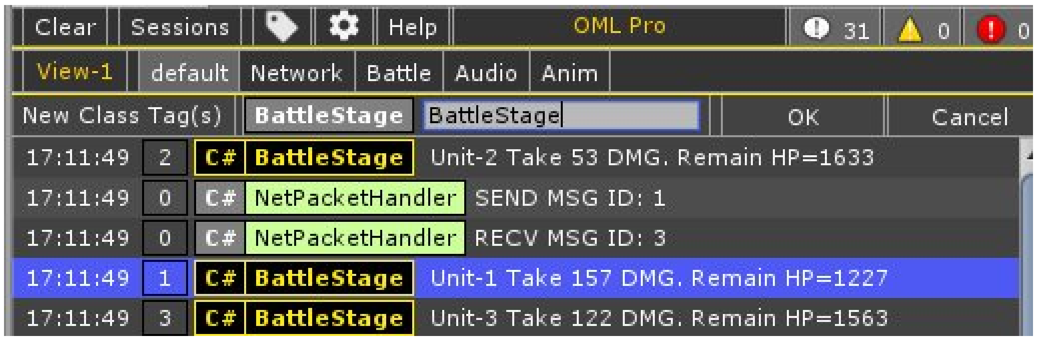
OML keeps a mapping table between the caller class and tag names.
When a log arrives, it check with the caller class name against the mapping table and see if any tag should be given to this log.


Setting

Auto Generate Mapping by Class Name.
e.g. logs from Tom.Speak() will be tagged with 'Tom'.

You can enable the "Auto generate Mapping by ClassName" setting to let OML auto insert new mapping for log messages. The log will be tagged using class name by default.

If you don't want to use the original class name and want to customize or group them. You can tag classes by selecting a class label and press **F2.**

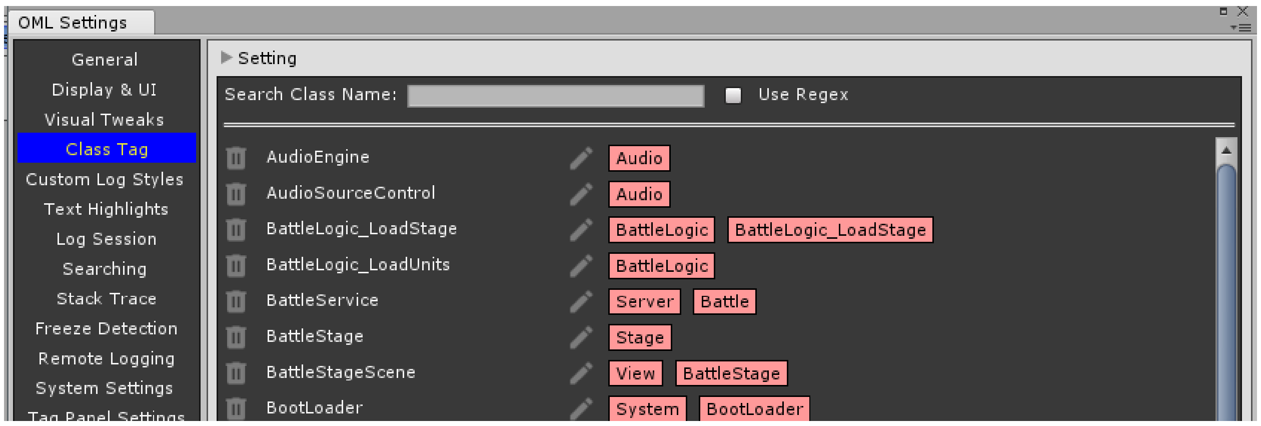


New Class Tag(s) BattleStage BattleStage

```
17:11:49  2  C#  BattleStage       Unit-2 Take 53 DMG. Remain HP=1633
17:11:49  0  C#  NetPacketHandler  SEND MSG ID: 1
17:11:49  0  C#  NetPacketHandler  RECV MSG ID: 3
17:11:49  1  C#  BattleStage       Unit-1 Take 157 DMG. Remain HP=1227
17:11:49  3  C#  BattleStage       Unit-3 Take 122 DMG. Remain HP=1563
```

This will bring up a UI for creating new class tag.

There is a built-in UI for editing those mappings from setting window.



AudioEngine	Audio
AudioSourceControl	Audio
BattleLogic_LoadStage	BattleLogic, BattleLogic_LoadStage
BattleLogic_LoadUnits	BattleLogic
BattleService	Server, Battle
BattleStage	Stage
BattleStageScene	View, BattleStage
BootLoader	System, BootLoader

You can also open ***<Project Dir>/oml.class_tags.xml*** to group/rename the mappings manually.

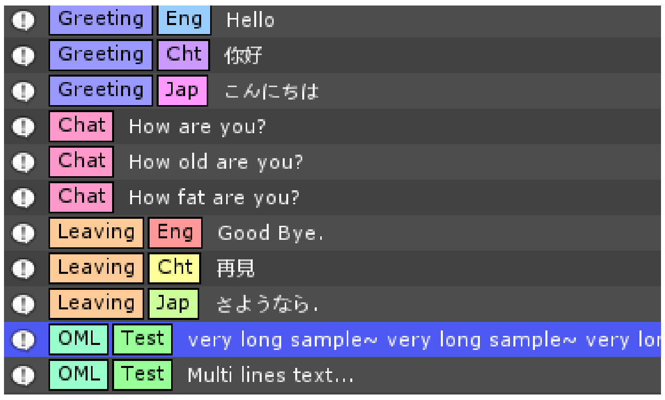
Tips: don't forget to press the [Reload] button after you manually edited the mapping data file. If auto reload is not checked.

Tag Operations

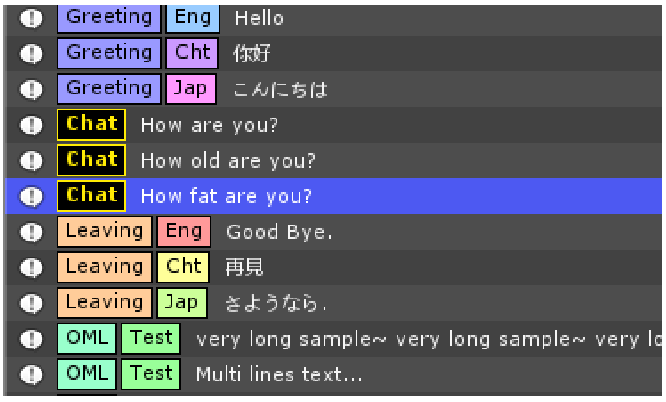
Once you have your logs tagged, you can do something with them like filtering in some simple ways.

Selecting a tag

Just click on a tag to select it. A selected tag appear in yellow black color.
To unselect a tag, simply click on it again.



```
Greeting Eng  Hello
Greeting Cht  你好
Greeting Jap  こんにちは
Chat  How are you?
Chat  How old are you?
Chat  How fat are you?
Leaving Eng  Good Bye.
Leaving Cht  再見
Leaving Jap  さようなら.
OML Test  very long sample~ very long sample~ very lo
OML Test  Multi lines text...
```



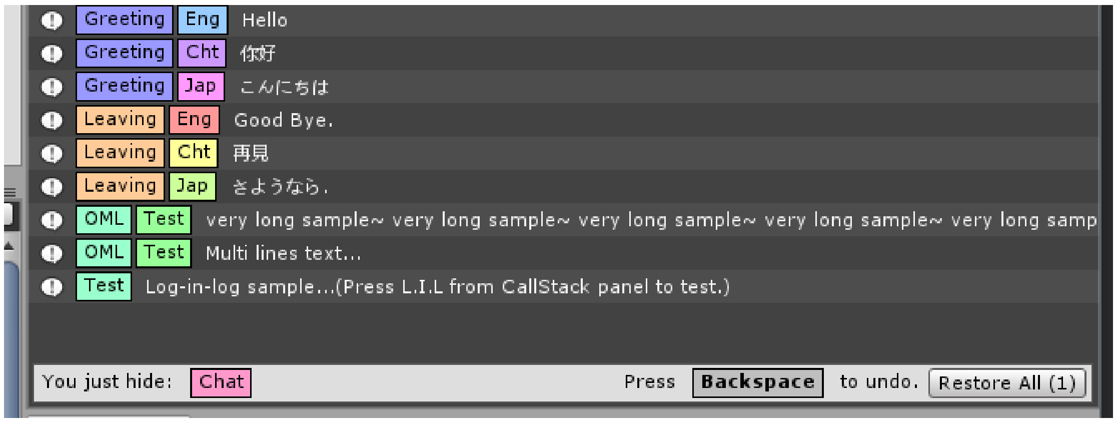
```
Greeting Eng  Hello
Greeting Cht  你好
Greeting Jap  こんにちは
Chat  How are you?
Chat  How old are you?
Chat  How fat are you?
Leaving Eng  Good Bye.
Leaving Cht  再見
Leaving Jap  さようなら.
OML Test  very long sample~ very long sample~ very lo
OML Test  Multi lines text...
```

Hiding logs with tag (PRO Version only)

1. Select a tag
2. Press [DEL] button

A hint will be shown at the bottom about your hidden tag. (can be turned off)

To restore the tag you last hide, press the [BackSpace] button from your keyboard once. You can also click on the [Restore All] on the hint UI to unhide tags you DEL'ed,



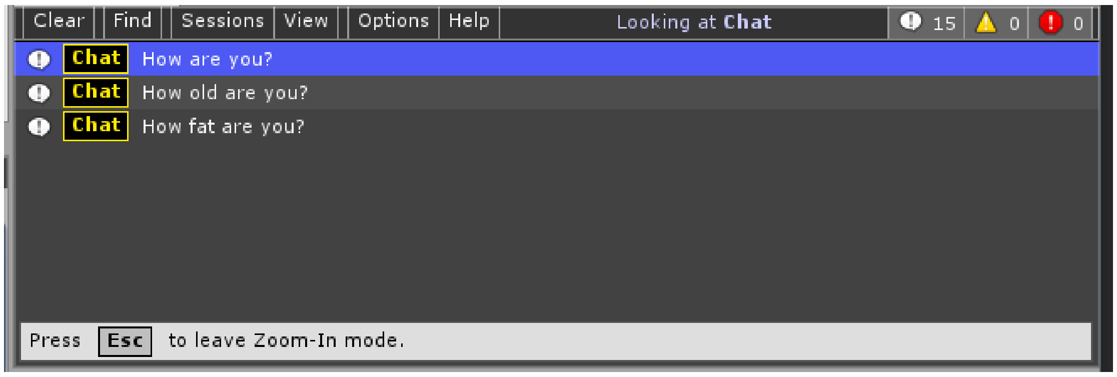
```
Greeting Eng  Hello
Greeting Cht  你好
Greeting Jap  こんにちは
Leaving Eng  Good Bye.
Leaving Cht  再見
Leaving Jap  さようなら.
OML Test  very long sample~ very long sample~ very long sample~ very long sample~ very long samp
OML Test  Multi lines text...
Test  Log-in-log sample...(Press L.I.L from CallStack panel to test.)

You just hide: Chat                Press Backspace to undo. Restore All (1)
```

<u>Focus on a single tag.</u> (a.k.a. Zoom-In mode) (PRO Verion only)

If you want to show only logs with a certain tag, you can zoom-in to the tag.
All other logs without that tag will be hidden.

1. Select the tag you want to focus on.
2. Press [**Enter**] key.

Press [**Esc**] key to exit Zoom-In mode.



```
Chat  How are you?
Chat  How old are you?
Chat  How fat are you?

Press  Esc  to leave Zoom-In mode.
```

Example of zoomed in to the [Chat] tag.

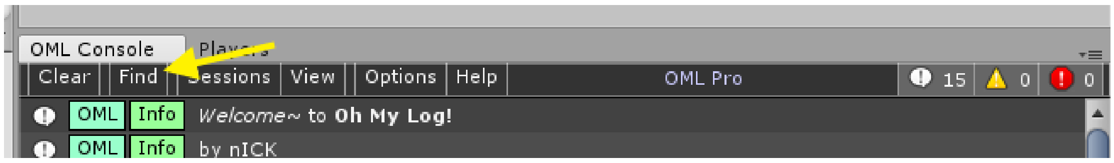
Shortcut at the bottom can be turned off from the settings.

Top menu will also hint you about the current zoomed in tag.

<u>Searching the log messages</u>

Searching text from log messages is easy. To start searching, you can either

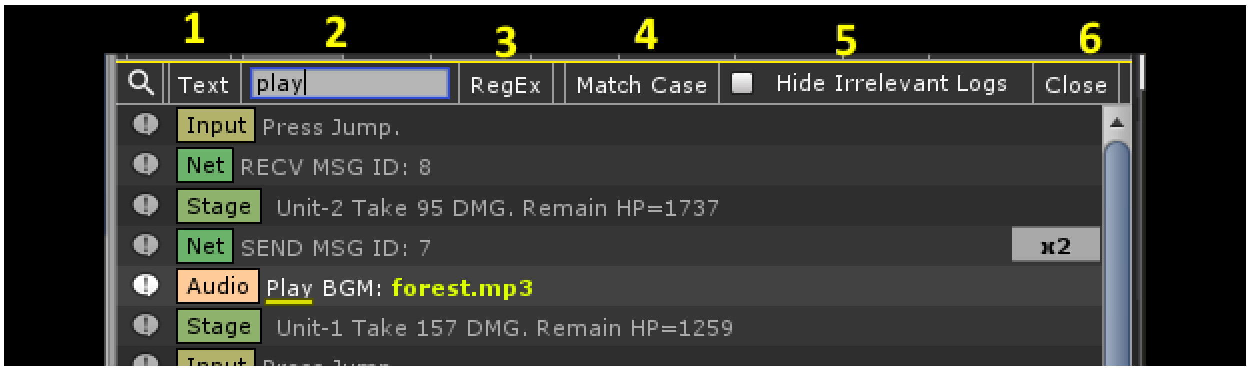
1. click on the [**Find**] button on the top menu.
2. **Simply start typing** when the console has focus on it.



```
OML Info Welcome~ to Oh My Log!
OML Info by nICK
```

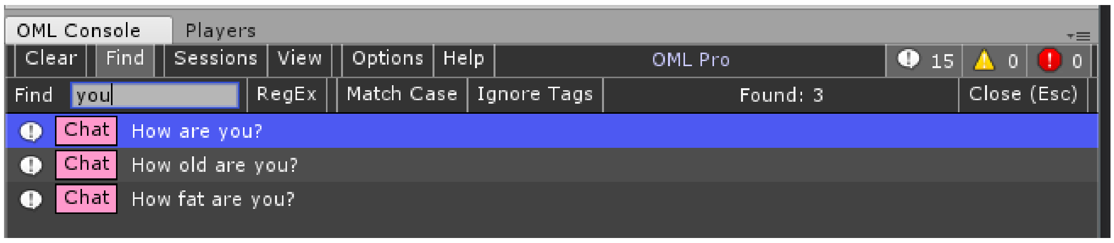
The [Find] button is there just for completeness. You don't need to use it but just click anywhere and start typing.

<u>Finder Interface</u>



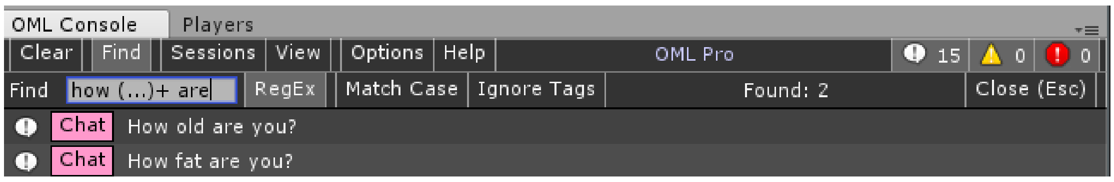
```
Input Press Jump.
Net   RECV MSG ID: 8
Stage  Unit-2 Take 95 DMG. Remain HP=1737
Net   SEND MSG ID: 7                                   x2
Audio Play BGM: forest.mp3
Stage  Unit-1 Take 157 DMG. Remain HP=1259
```

1. Search target. Text or Tag
2. Input box for search text or Regular Expression pattern.
3. Enable/disable Regular Expression search.
4. Toggle whether searching should be case sensitive
5. Toggle filter mode which will hide irrelevant logs.
6. Close the Finder. You can simply press ESC which is more direct.



```
Chat How are you?
Chat How old are you?
Chat How fat are you?
```

Simple text search



```
Chat How old are you?
Chat How fat are you?
```

Regular Expression search

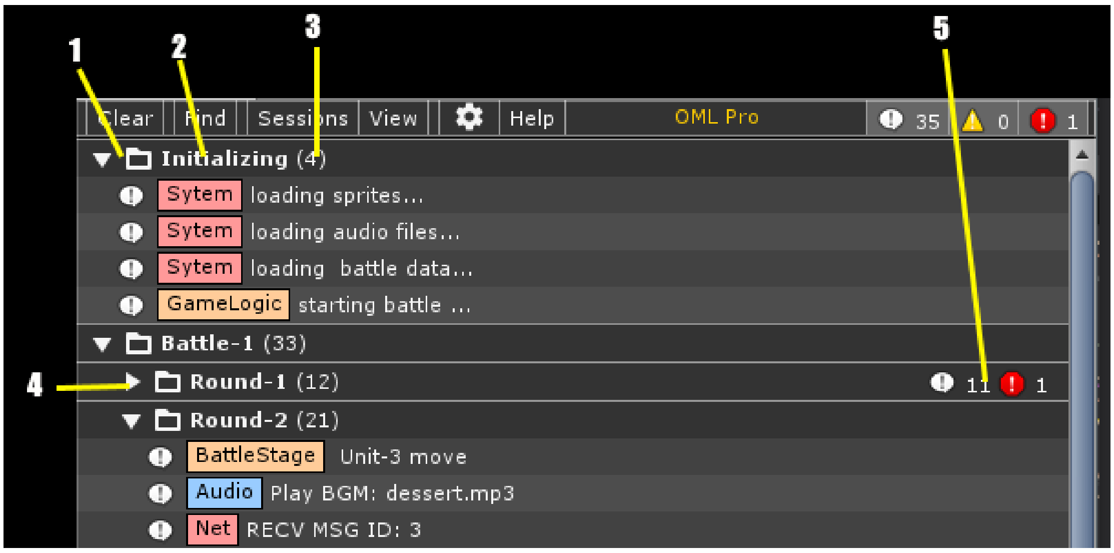
Log Session (PRO Version only)

What is a log session and why?

A log session is a chunk of logs created within a time period.
Once logs are under a section, you can fold/unfold it to help you read them.
The session bar between logs also stands out and helps you identify important phases in your game.

Session Interface

1. A session row representing the start of a session
2. Session name
3. Total log count in this session
4. A folded sub-session.
5. Logs count by log type (info, warning, error) in this folded session.



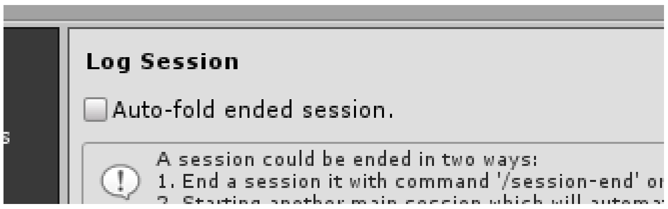
```
Initializing (4)
    Sytem loading sprites...
    Sytem loading audio files...
    Sytem loading  battle data...
    GameLogic starting battle ...
Battle-1 (33)
  Round-1 (12)                                   11  1
  Round-2 (21)
    BattleStage  Unit-3 move
    Audio Play BGM: dessert.mp3
    Net RECV MSG ID: 3
```

"Round-1" session is folded, logs within it will not be shown, providing a cleaner view.

Tips:

-Use right-click on a session row to fold/unfold it instead of only selecting it.

-You can check the "Auto-fold ended session" to let OML auto fold a session when it is completed.



Log Session

[ ] Auto-fold ended session.

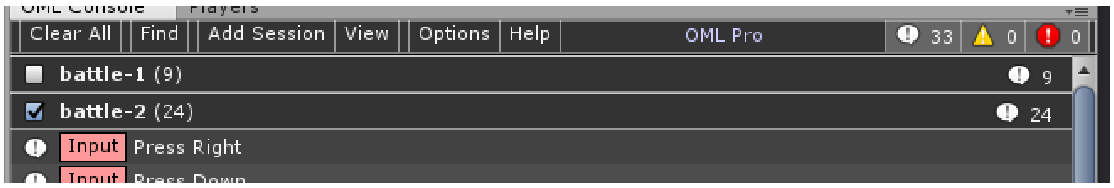
A session could be ended in two ways:
1. End a session it with command '/session-end' or
2. Starting another main session which will autom

<u>How to start/stop a session?</u>

To start a session…

Option.1 - New session <u>by hand manually</u>

You can start a session whenever you want by
1. Hold Down [Ctrl] to toggle the top menu to show alternative buttons.
2. Click [Add Session]



When holding down the [Ctrl] key, the top menu shows [Add Session] instead of the normal [Session] button.

Option.2 - New session <u>by code automatically</u>

You can create new sessions automatically by logging special commands.

To start a new session or sub-session:
/session <NAME>

* <NAME> is optional, When not provided, auto naming will be used.

To start a new **main** session and close all other existing sessions:
/main-session

To end a session:
/session-end <NAME>

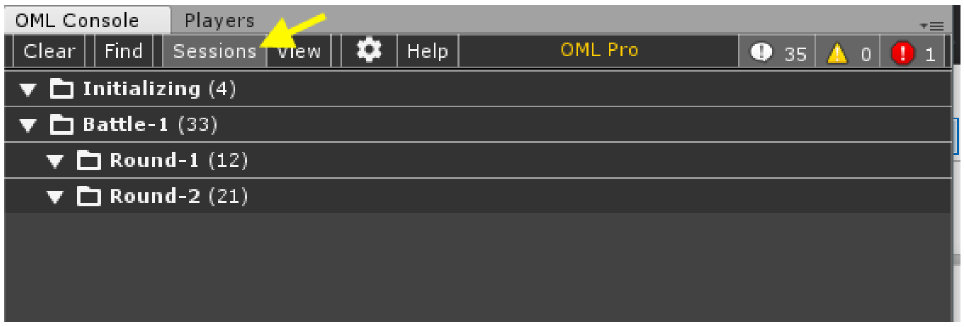
* <NAME> is optional. When not provided, the current session will be ended.

Example

```
Debug.Log("/session PlayerTurn");
```

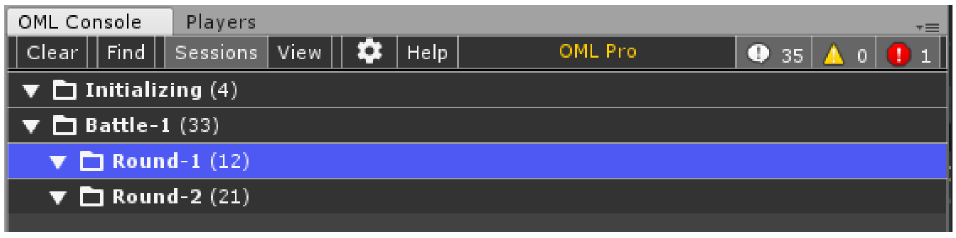
NOTE: When a session is started during another session, the old session will be ended automatically.

<u>Session List Viewl</u>

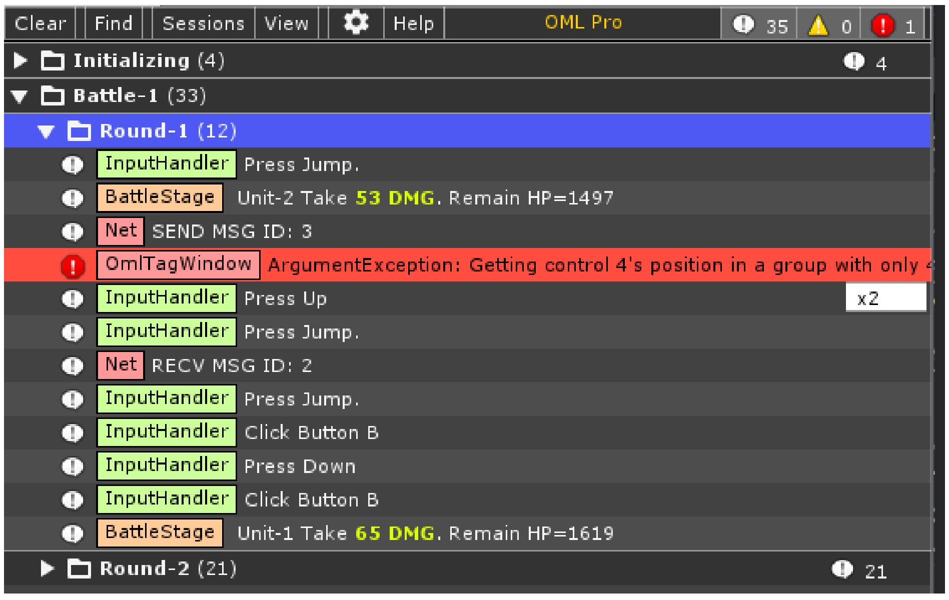


```
▼ Initializing (4)
▼ Battle-1 (33)
  ▼ Round-1 (12)
  ▼ Round-2 (21)
```

The session list view mode is enabled by clicking on the [Sessions] button on OML top menu.
It allow you to quickly see all the sessions and go to them more quickly.



```
▼ Initializing (4)
▼ Battle-1 (33)
  ▼ Round-1 (12)
  ▼ Round-2 (21)
```

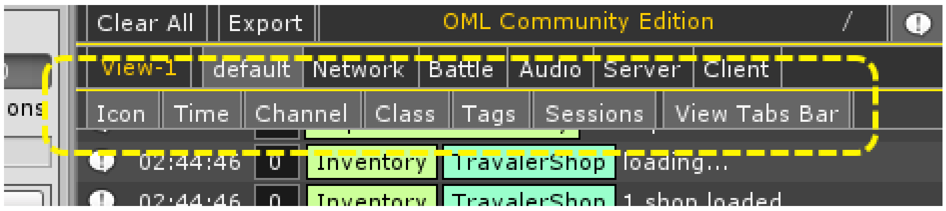


```
▶ Initializing (4)                                        4
▼ Battle-1 (33)
  ▼ Round-1 (12)
      InputHandler  Press Jump.
      BattleStage  Unit-2 Take 53 DMG. Remain HP=1497
      Net  SEND MSG ID: 3
      OmlTagWindow  ArgumentException: Getting control 4's position in a group with only
      InputHandler  Press Up                               x2
      InputHandler  Press Jump.
      Net  RECV MSG ID: 2
      InputHandler  Press Jump.
      InputHandler  Click Button B
      InputHandler  Press Down
      InputHandler  Click Button B
      BattleStage  Unit-1 Take 65 DMG. Remain HP=1619
  ▶ Round-2 (21)                                          21
```

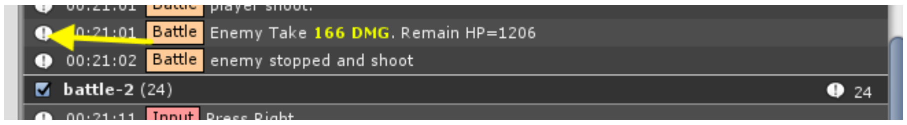
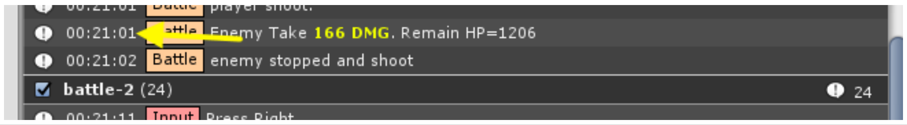
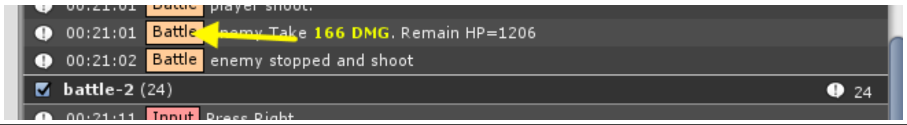
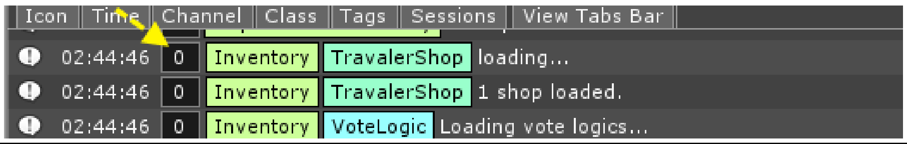
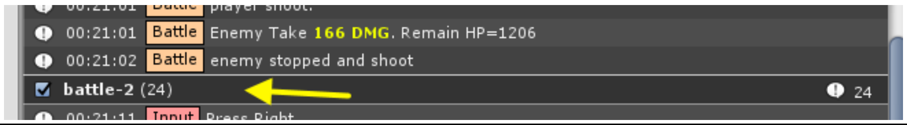
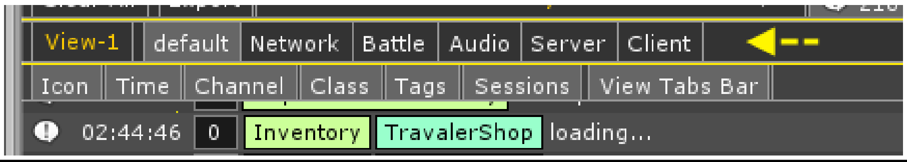
Select a session row and press Enter to view a particular session OR press [Sessions] button again to restore original log view.

Display Settings

You can access view settings from the view setting bar OR from the option panel.
View setting bar can be toggled by holding down Ctrl Key.



```
Clear All | Export |        OML Community Edition        /
View-1 | default | Network | Battle | Audio | Server | Client
Icon | Time | Channel | Class | Tags | Sessions | View Tabs Bar
02:44:46  0  Inventory  TravalerShop  loading...
02:44:46  0  Inventory  TravalerShop  1 shop loaded
```

Log Icon	Toggle whether log row show log type icon  00:21:01 Battle Enemy Take 166 DMG. Remain HP=1206 00:21:02 Battle enemy stopped and shoot battle-2 (24) 24
Time	Toggle whether log row show timestamp  00:21:01 Battle Enemy Take 166 DMG. Remain HP=1206 00:21:02 Battle enemy stopped and shoot battle-2 (24) 24
Tags	Toggle whether log row show tags  00:21:01 Battle Enemy Take 166 DMG. Remain HP=1206 00:21:02 Battle enemy stopped and shoot battle-2 (24) 24
Channel	Toggle whether log row show channel number  Icon | Time | Channel | Class | Tags | Sessions | View Tabs Bar 02:44:46 0 Inventory TravalerShop loading... 02:44:46 0 Inventory TravalerShop 1 shop loaded. 02:44:46 0 Inventory VoteLogic Loading vote logics...
Sessions	Toggle whether log row show session rows  00:21:01 Battle Enemy Take 166 DMG. Remain HP=1206 00:21:02 Battle enemy stopped and shoot battle-2 (24) 24
View Tabs Bar	Toggle whether to display Advance Filtering bar. (will talk more about this later)  View-1 | default | Network | Battle | Audio | Server | Client Icon | Time | Channel | Class | Tags | Sessions | View Tabs Bar 02:44:46 0 Inventory TravalerShop loading...

<u>Advance Filtering (View Tabs Bar)</u>

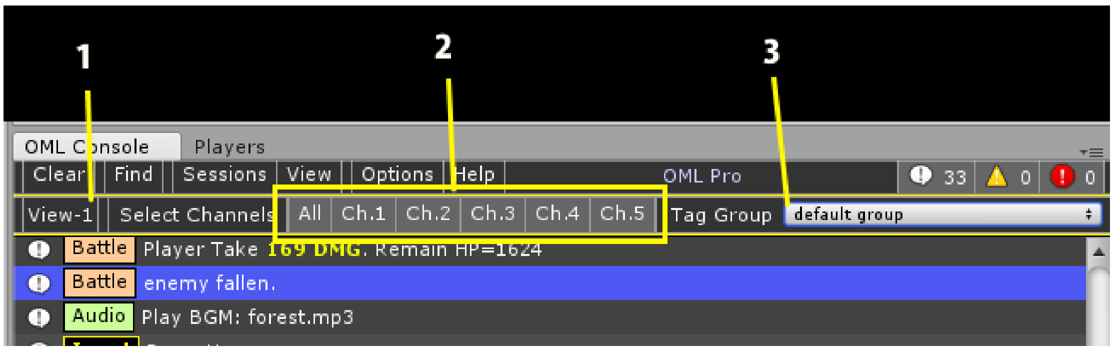
Advance filtering consist of two main filtering mechanisms: <u>Tag Group</u> and <u>Channel</u>
They both have their own unique characteristics that make them best suited for certain scenarios.

<u>Interface</u>

1. The tab bar. It also shows the current view number.
If you have opened multiple consoles, you will see one showing View-1 and the other showing View-2 on its own tab bar.

2. Log Channel to be applied to the current log stream.
You can **normal Click** to select a channel or **Ctrl+Click** to toggle a channel (to make a combination).

3. Tag group to be applied to the current log stream.



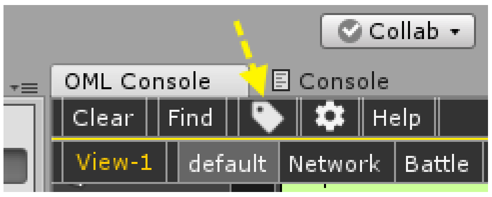
```
Battle  Player Take 169 DMG. Remain HP=1624
Battle  enemy fallen.
Audio   Play BGM: forest.mp3
```

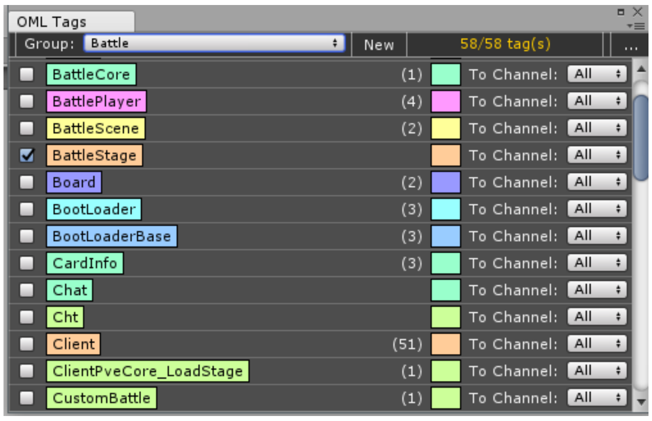
<u>Tag Group</u>

Tag group is just a group of tags with its state saved in a group so that you could apply them to your logs without toggling those tags one by one every time.

E.g. When working on the networking part of my game, I would have a tag group named Network with all the networking related tags checked. Then I could have one log stream showing the network activity and the other log stream showing other gaming logs in another secondary *console*.

If you want to check out the list of current tags, you can open the OML Tags penal from Unity Menu -> [Tools] -> [OML Consoles] -> [Tags]
OR simply press the tag icon button from the top menu.

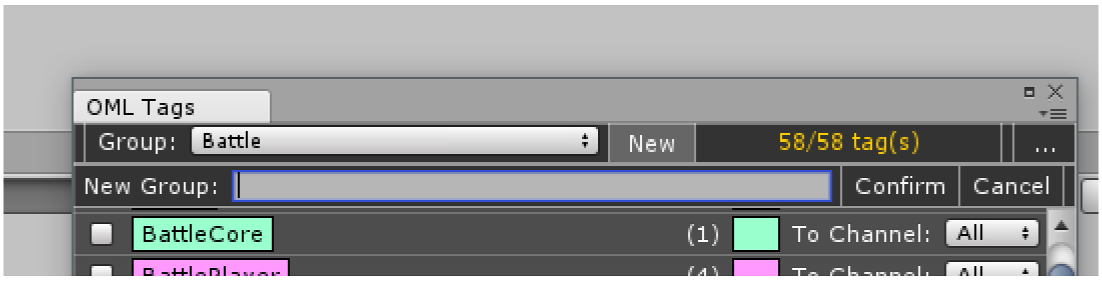




☐	BattleCore	(1)	To Channel:	All
☐	BattlePlayer	(4)	To Channel:	All
☐	BattleScene	(2)	To Channel:	All
✓	BattleStage		To Channel:	All
☐	Board	(2)	To Channel:	All
☐	BootLoader	(3)	To Channel:	All
☐	BootLoaderBase	(3)	To Channel:	All
☐	CardInfo	(3)	To Channel:	All
☐	Chat		To Channel:	All
☐	Cht		To Channel:	All
☐	Client	(51)	To Channel:	All
☐	ClientPveCore_LoadStage	(1)	To Channel:	All
☐	CustomBattle	(1)	To Channel:	All

Managnig Tag Group

You can create a new tag group by pressing the [New] button on the top.



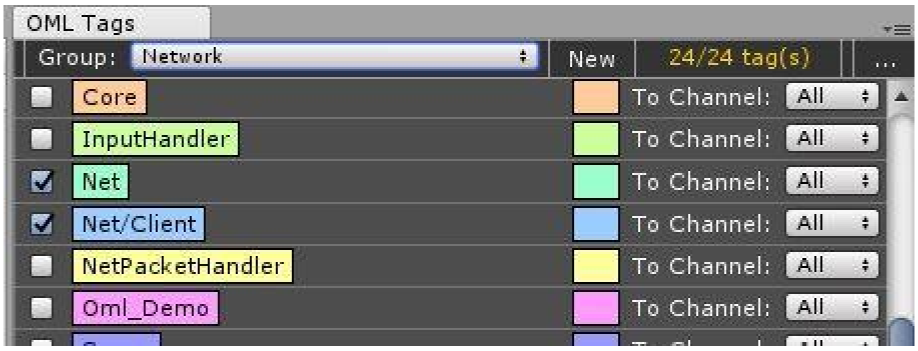
If you need to delete a tag group, hold down the Ctrl key to toggle hidden UI. The [delete] button is right next to the [new] button.

Assign tags to Tag Group

You can assign a tag to a tag group in two different ways.

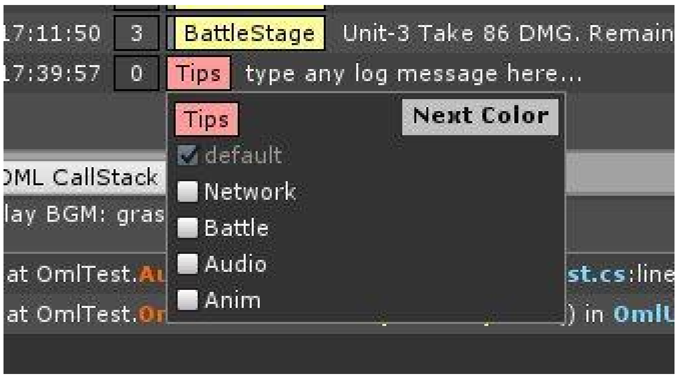
1. Assign from tag panel.

A. .Select the group you want to assign to.
B. Find the tag and check the check box on the left.
(you can easily find any existing tag by just typing on the panel.)



2. Assign from console

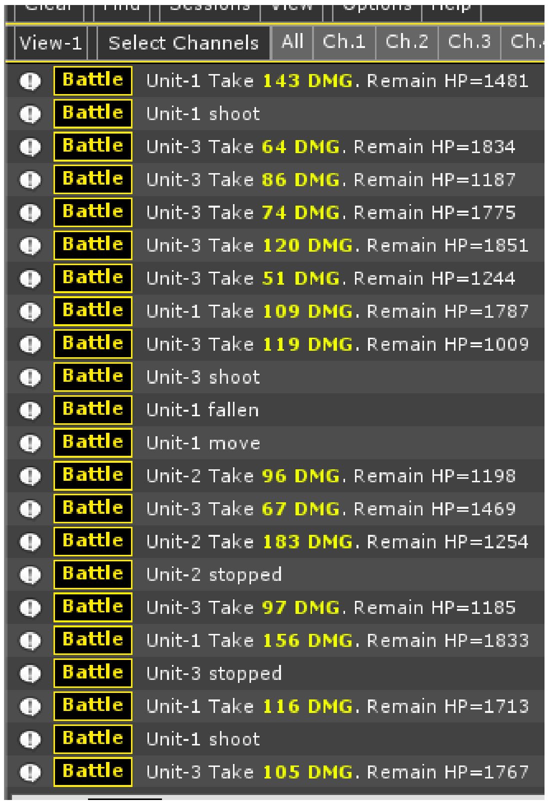
A. Right-click on the tag
B. Check the target tag group



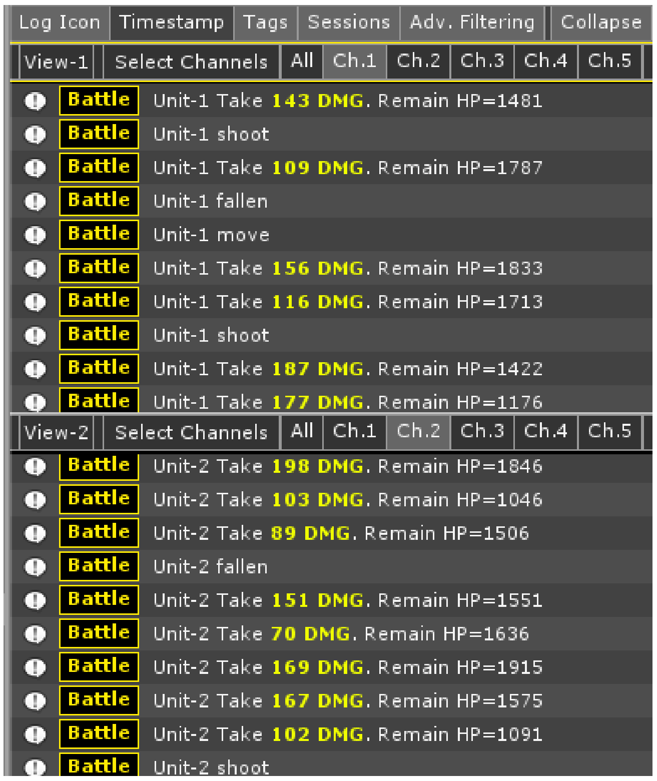
Log Channel

Logs by default will reach all channels. If a log is set to a channel, only the view with that channel enabled will see that log.

Channel filtering is VERY useful when you have log messages printing the same thing from different instances of the same kind. In that case, they will generally have the same tags and it is very hard to distinguish them visually even if you print out their ID. With log-channel, you can do filtering on them.



```
Battle  Unit-1 Take 143 DMG. Remain HP=1481
Battle  Unit-1 shoot
Battle  Unit-3 Take 64 DMG. Remain HP=1834
Battle  Unit-3 Take 86 DMG. Remain HP=1187
Battle  Unit-3 Take 74 DMG. Remain HP=1775
Battle  Unit-3 Take 120 DMG. Remain HP=1851
Battle  Unit-3 Take 51 DMG. Remain HP=1244
Battle  Unit-1 Take 109 DMG. Remain HP=1787
Battle  Unit-3 Take 119 DMG. Remain HP=1009
Battle  Unit-3 shoot
Battle  Unit-1 fallen
Battle  Unit-1 move
Battle  Unit-2 Take 96 DMG. Remain HP=1198
Battle  Unit-3 Take 67 DMG. Remain HP=1469
Battle  Unit-2 Take 183 DMG. Remain HP=1254
Battle  Unit-2 stopped
Battle  Unit-3 Take 97 DMG. Remain HP=1185
Battle  Unit-1 Take 156 DMG. Remain HP=1833
Battle  Unit-3 stopped
Battle  Unit-1 Take 116 DMG. Remain HP=1713
Battle  Unit-1 shoot
Battle  Unit-3 Take 105 DMG. Remain HP=1767
```



```
Battle  Unit-1 Take 143 DMG. Remain HP=1481
Battle  Unit-1 shoot
Battle  Unit-1 Take 109 DMG. Remain HP=1787
Battle  Unit-1 fallen
Battle  Unit-1 move
Battle  Unit-1 Take 156 DMG. Remain HP=1833
Battle  Unit-1 Take 116 DMG. Remain HP=1713
Battle  Unit-1 shoot
Battle  Unit-1 Take 187 DMG. Remain HP=1422
Battle  Unit-1 Take 177 DMG. Remain HP=1176
```

```
Battle  Unit-2 Take 198 DMG. Remain HP=1846
Battle  Unit-2 Take 103 DMG. Remain HP=1046
Battle  Unit-2 Take 89 DMG. Remain HP=1506
Battle  Unit-2 fallen
Battle  Unit-2 Take 151 DMG. Remain HP=1551
Battle  Unit-2 Take 70 DMG. Remain HP=1636
Battle  Unit-2 Take 169 DMG. Remain HP=1915
Battle  Unit-2 Take 167 DMG. Remain HP=1575
Battle  Unit-2 Take 102 DMG. Remain HP=1091
Battle  Unit-2 shoot
```

On the left without channel filtering , logs about units taking damage are crossing with each other between Units. On the right, you can use channels to separate them to track a certain instance much more easily. You can also use multiple consoles to observe different things.

To write a log to a channel, prepend your log message with [#<channel>] syntax.

Example:

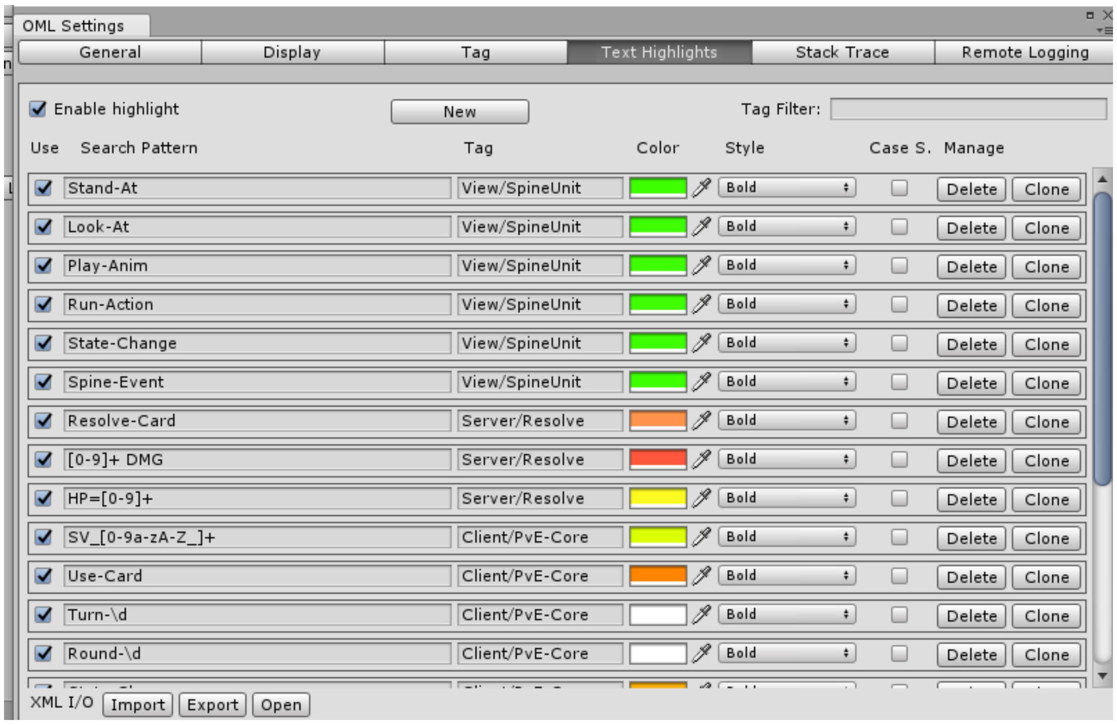
```
Debug.Log("[#1] sample log message.");        // log to channel 1
Debug.Log("[Battle#1] sample log message.");        // log to channel 1 with a tag.
Debug.Log("[Data*#1] sample log message.");        // similar but allow class tag to the added on the right.
```

Highlights

Highlights help you colorize your log and make key words or information stand out so that you can spot them more easily.

Setting Interface

Open the setting interface from [Options] and go to tab [Text Highlight].



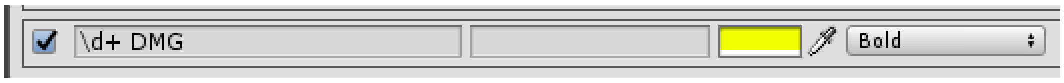
✓ Enable highlight

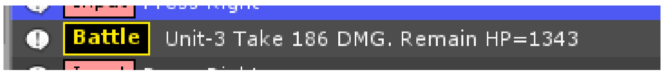
Tag Filter:

Use	Search Pattern	Tag	Color	Style	Case S.	Manage
✓	Stand-At	View/SpineUnit	🟩	Bold	☐	Delete Clone
✓	Look-At	View/SpineUnit	🟩	Bold	☐	Delete Clone
✓	Play-Anim	View/SpineUnit	🟩	Bold	☐	Delete Clone
✓	Run-Action	View/SpineUnit	🟩	Bold	☐	Delete Clone
✓	State-Change	View/SpineUnit	🟩	Bold	☐	Delete Clone
✓	Spine-Event	View/SpineUnit	🟩	Bold	☐	Delete Clone
✓	Resolve-Card	Server/Resolve	🟧	Bold	☐	Delete Clone
✓	[0-9]+ DMG	Server/Resolve	🟥	Bold	☐	Delete Clone
✓	HP=[0-9]+	Server/Resolve	🟨	Bold	☐	Delete Clone
✓	SV_[0-9a-zA-Z_]+	Client/PvE-Core	🟨	Bold	☐	Delete Clone
✓	Use-Card	Client/PvE-Core	🟧	Bold	☐	Delete Clone
✓	Turn-\d	Client/PvE-Core	⬜	Bold	☐	Delete Clone
✓	Round-\d	Client/PvE-Core	⬜	Bold	☐	Delete Clone

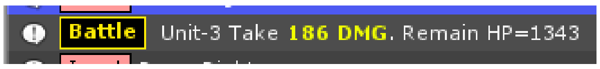
Use	Whether enable this highlight or not.
Search Pattern	Text or regex you want to highlight
Tag	Empty to apply to all tags. Type a tag path to restrict search range and improve performance.
Color	Highlight color, use transparent if you only want to apply font style like bold or italic
Style	Set highlight font style. (normal, bold, italic)
Case S.	Set whether the search should be case sensitive
Delete Button	Delete this highlight

Example: highlighting damage with Regex.


```
\d+ DMG
```
Bold


Battle Unit-3 Take 186 DMG. Remain HP=1343

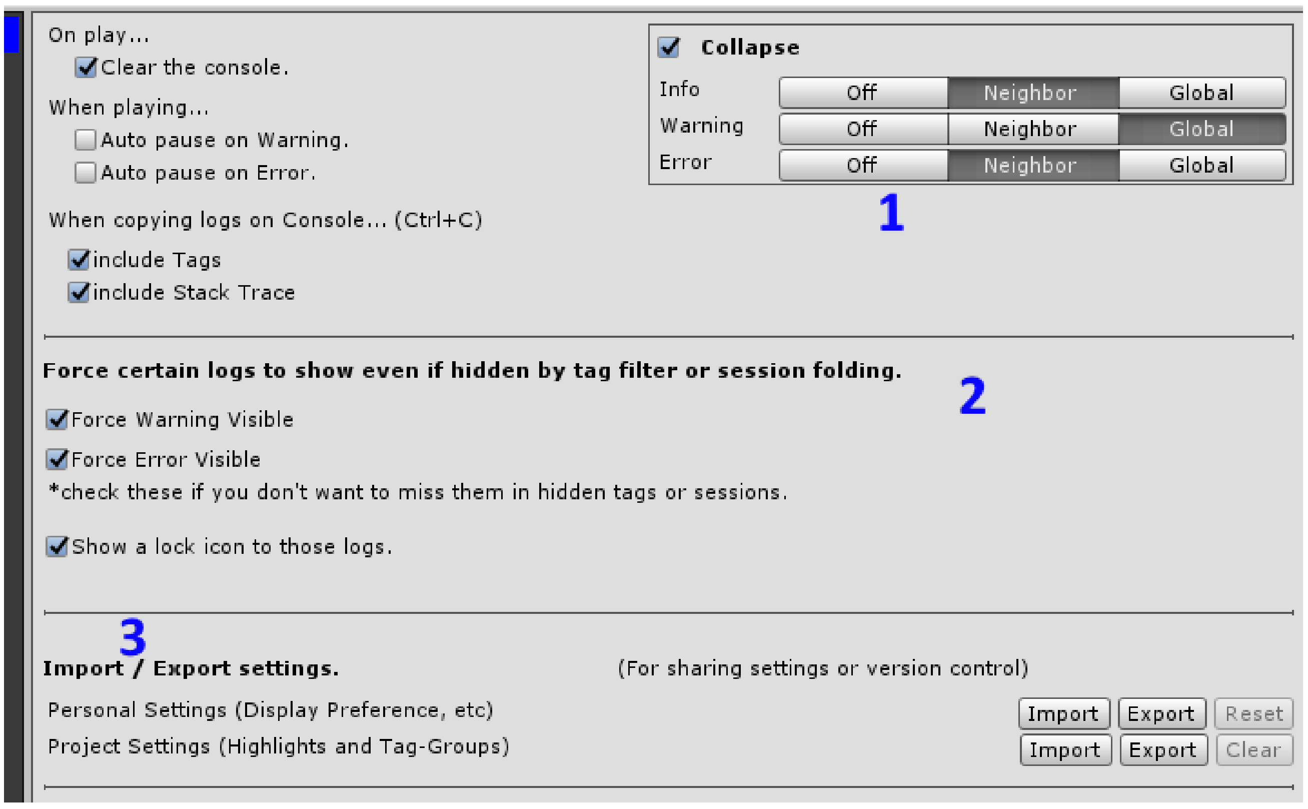
Before


Battle Unit-3 Take **186 DMG**. Remain HP=1343

After

NOTE:
Due to unity rich text limitation , you cannot have multiple highlights partially overlapping with each other. Only the 1st hit will be applied.

Some Useful Settings



On play...

☑ Clear the console.

When playing...

☐ Auto pause on Warning.

☐ Auto pause on Error.

When copying logs on Console... (Ctrl+C)

☑ include Tags

☑ include Stack Trace

☑ **Collapse**

Info	Off	[✓ Neighbor]	Global
Warning	Off	Neighbor	[✓ Global]
Error	Off	[✓ Neighbor]	Global

1

Force certain logs to show even if hidden by tag filter or session folding.

2

☑ Force Warning Visible

☑ Force Error Visible

*check these if you don't want to miss them in hidden tags or sessions.

☑ Show a lock icon to those logs.

3

Import / Export settings. (For sharing settings or version control)

Personal Settings (Display Preference, etc)

Project Settings (Highlights and Tag-Groups)

1. Collapsing settings

In OML, you can enable/disable collapse to each of the log types(info, warning and error) independently. Sometimes you only want to collapse warning and error but let info to print as usual.

You can also set “Neighbor mode” to only collapse logs with neighbors so that new repeating logs won’t ‘sink’ which in turn reduces the chance of you not seeing them appear.

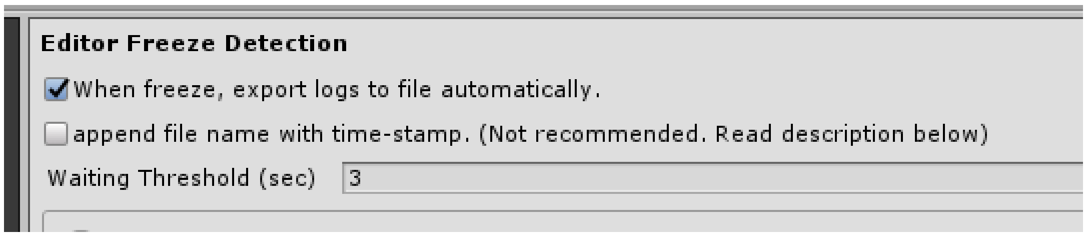
2. Force Warning, Error to display, ignoring tag and section filter.

Since the introduction of filtering, I found that there is a chance of missing error/warning if they were hidden by the current tag or section state. These option make them ignore these two filters and always visible.

3. Import/Export settings

Use this to share OML settings between computers or user.
(Buy your legit OML copies to be used by different users!)

Unity Freeze Detection and auto export



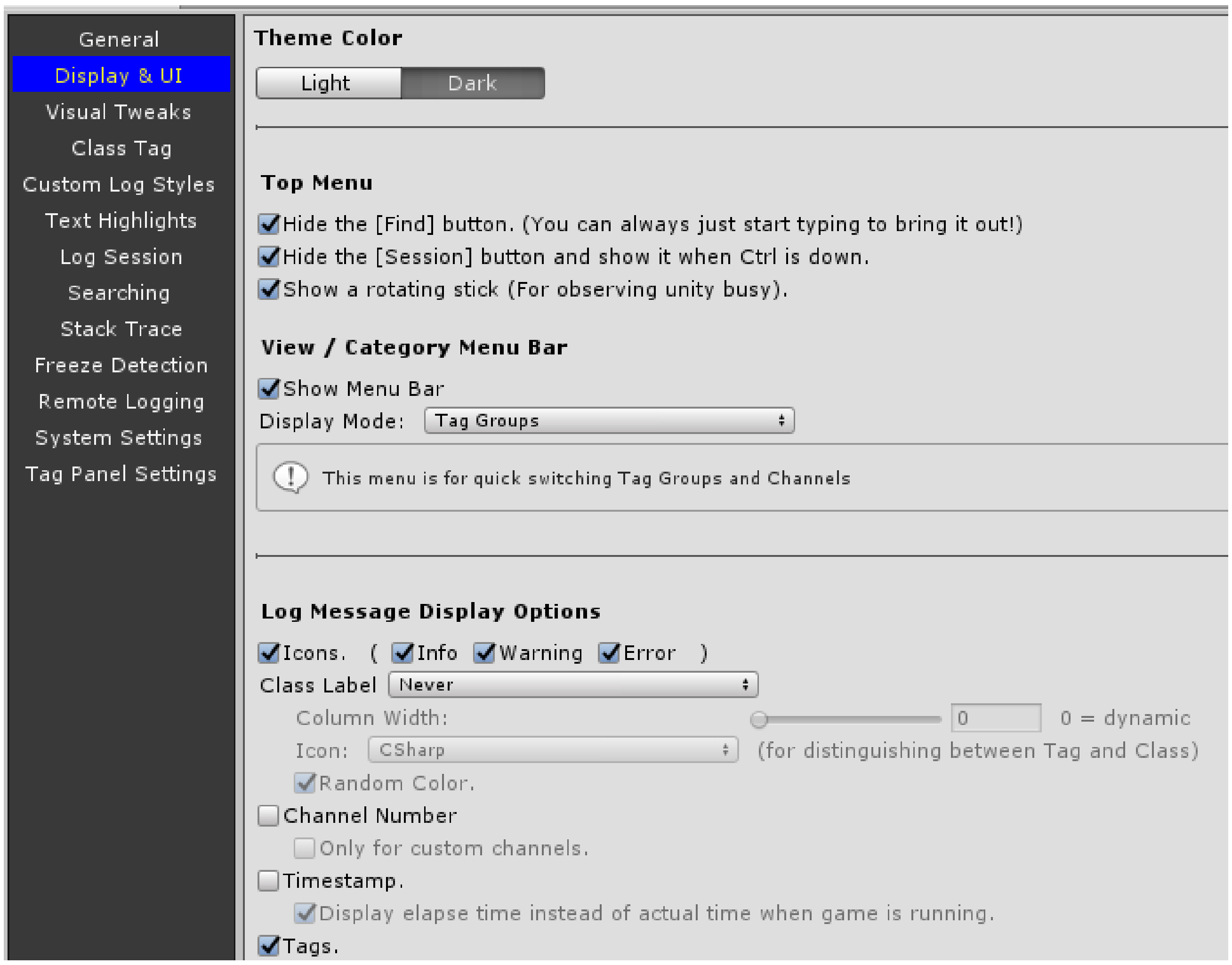
Editor Freeze Detection

- [✓] When freeze, export logs to file automatically.
- [ ] append file name with time-stamp. (Not recommended. Read description below)

Waiting Threshold (sec) 3

When enabled, OML will auto export current logs to the project folder if A freeze is detected.
When the Unity editor is freezed (e.g. dead loop situation) , everything including the console is not responsive. This could be a way to help you understand what happens before the freeze.

Many of the settings are self explanatory.



Theme Color

Light | Dark

Top Menu

- [✓] Hide the [Find] button. (You can always just start typing to bring it out!)
- [✓] Hide the [Session] button and show it when Ctrl is down.
- [✓] Show a rotating stick (For observing unity busy).

View / Category Menu Bar

- [✓] Show Menu Bar

Display Mode: Tag Groups

This menu is for quick switching Tag Groups and Channels

Log Message Display Options

- [✓] Icons. ([✓] Info [✓] Warning [✓] Error)

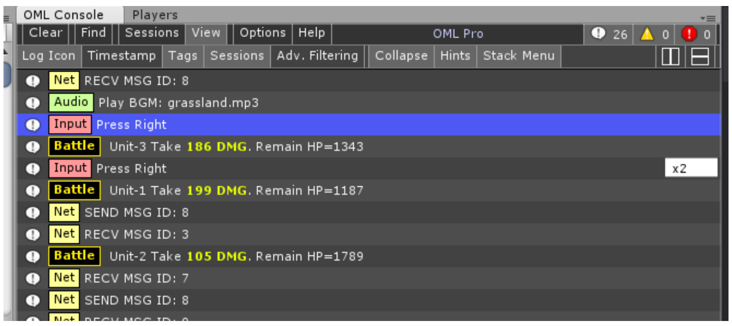
Class Label Never

Column Width: 0 0 = dynamic

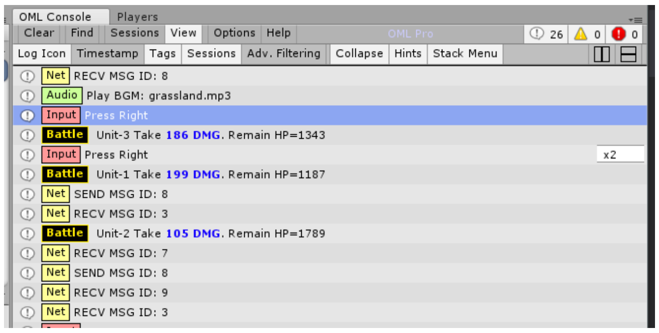
Icon: CSharp (for distinguishing between Tag and Class)

- [✓] Random Color.
- [ ] Channel Number
  - [ ] Only for custom channels.
- [ ] Timestamp.
  - [✓] Display elapse time instead of actual time when game is running.
- [✓] Tags.

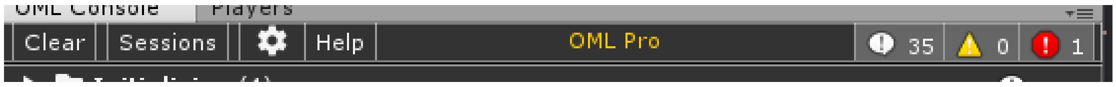
OML currently have two themes: Light and Dark



```
Net RECV MSG ID: 8
Audio Play BGM: grassland.mp3
Input Press Right
Battle Unit-3 Take 186 DMG. Remain HP=1343
Input Press Right                                x2
Battle Unit-1 Take 199 DMG. Remain HP=1187
Net SEND MSG ID: 8
Net RECV MSG ID: 3
Battle Unit-2 Take 105 DMG. Remain HP=1789
Net RECV MSG ID: 7
Net SEND MSG ID: 8
```

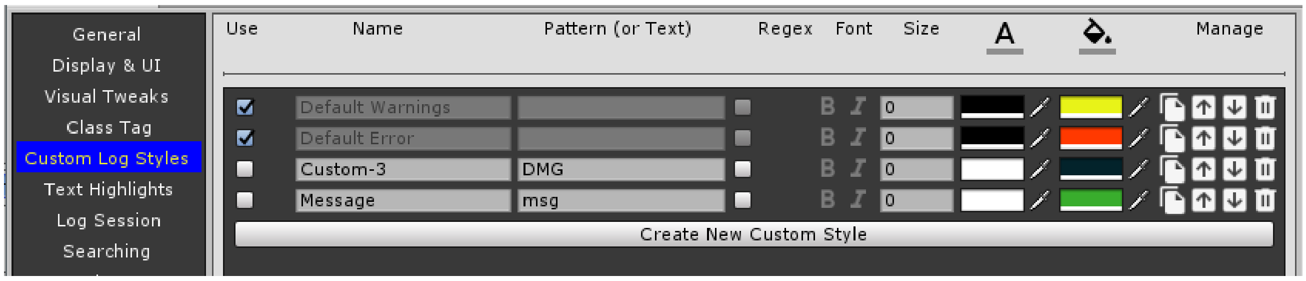


```
Net     RECV MSG ID: 8
Audio   Play BGM: grassland.mp3
Input   Press Right
Battle  Unit-3 Take 186 DMG. Remain HP=1343
Input   Press Right                                  x2
Battle  Unit-1 Take 199 DMG. Remain HP=1187
Net     SEND MSG ID: 8
Net     RECV MSG ID: 3
Battle  Unit-2 Take 105 DMG. Remain HP=1789
Net     RECV MSG ID: 7
Net     SEND MSG ID: 8
Net     RECV MSG ID: 9
Net     RECV MSG ID: 3
```



After hiding Find and View button

Custom Log Styles

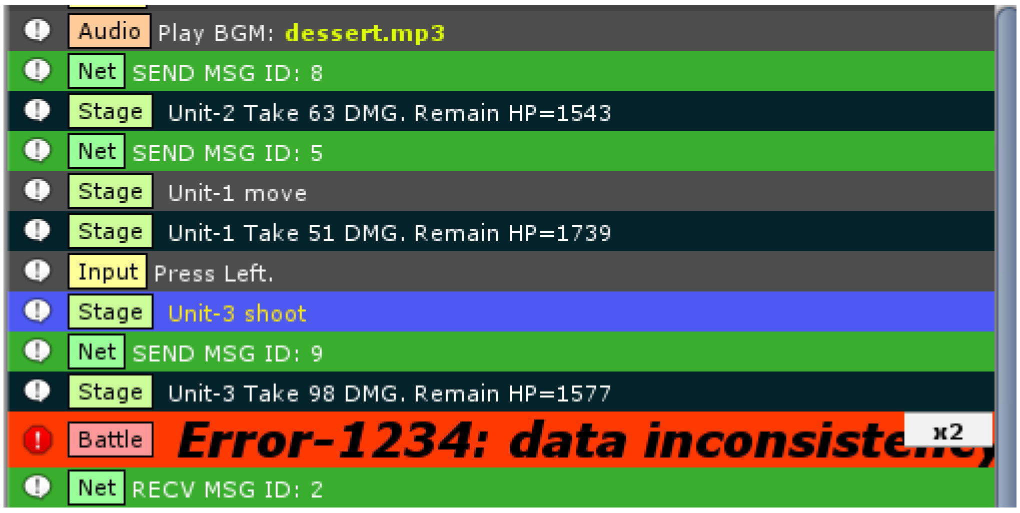


Use	Name	Pattern (or Text)	Regex	Font	Size	A	Fill	Manage
✓	Default Warnings		☐	B I	0	⬛	🟨	
✓	Default Error		☐	B I	0	⬛	🟥	
☐	Custom-3	DMG	☐	B I	0	⬜	⬛	
☐	Message	msg	☐	B I	0	⬜	🟩	

Custom Log Styles allow you to customize how logs are stylized when shown.

To customize the style for a certain log, you first need to define a search pattern to identify the log message. It can be regex search or simple text search. After that, any targeted log will be applied with the specified colors and font styles.

The styles at higher places in the list will be tested first.

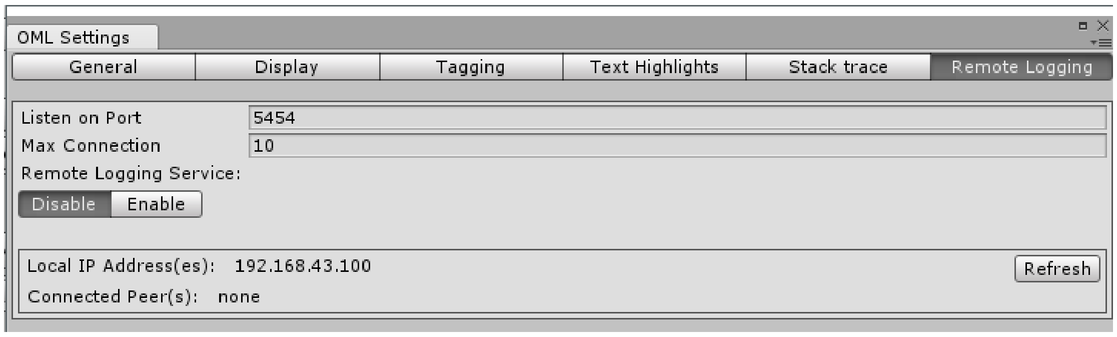


```
Audio   Play BGM: dessert.mp3
Net     SEND MSG ID: 8
Stage   Unit-2 Take 63 DMG. Remain HP=1543
Net     SEND MSG ID: 5
Stage   Unit-1 move
Stage   Unit-1 Take 51 DMG. Remain HP=1739
Input   Press Left.
Stage   Unit-3 shoot
Net     SEND MSG ID: 9
Stage   Unit-3 Take 98 DMG. Remain HP=1577
Battle  Error-1234: data inconsiste                  x2
Net     RECV MSG ID: 2
```

Remote Logging

OML also allows you to have logs messages pushed from a build (exe, android, etc) so that you can see how things are doing even outside the Unity editor.

It is as simple as placing a prefab to your application's first scene.



Listen on Port 5454
Max Connection 10
Remote Logging Service:
Local IP Address(es): 192.168.43.100
Connected Peer(s): none

Listen on Port
The UDP network port number to be used by OML to receive log messages from a build.
If you have firewall enabled, make sure your firewall setting allows messages to pass through this port.

Max Connection
Set a max number of connections allowed to connect.
E.g. when multiple clients are connecting to a server project.

To start the service, simply press the [Enable] button.
Local IP addresses are at the info box for your convenience.

Client Side Config

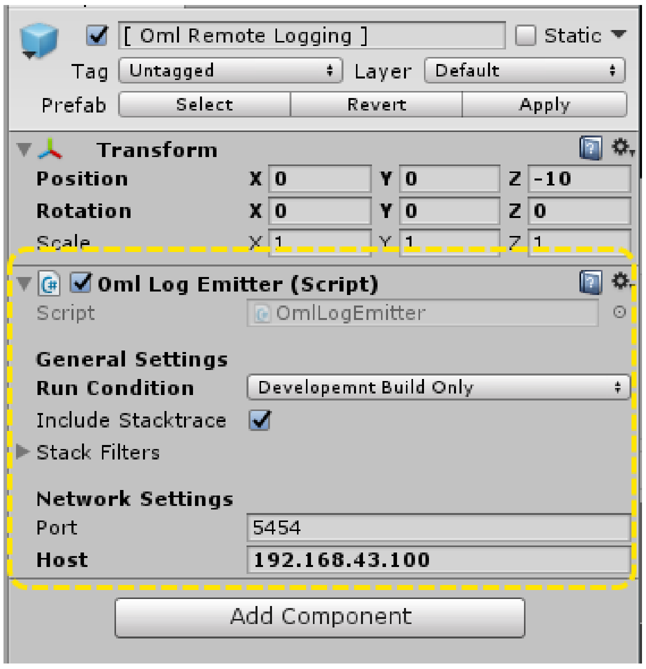
Run Condition

Set whether log upload should only be enabled in Development build or even release build.

Include Stacktrace
Turn off to have better performance if you don’t want to have stacktrace included.

Stacktrace fiters
For filtering unimportant stacktrace.

Network Settings
Port and host IP address to OML running computer.



[Oml Remote Logging]
Tag Untagged Layer Default
Position X 0 Y 0 Z -10
Rotation X 0 Y 0 Z 0
Scale X 1 Y 1 Z 1
Oml Log Emitter (Script)
Script OmlLogEmitter
General Settings
Run Condition Developemnt Build Only
Include Stacktrace ✓
Network Settings
Port 5454
Host 192.168.43.100

OML Watch Panel

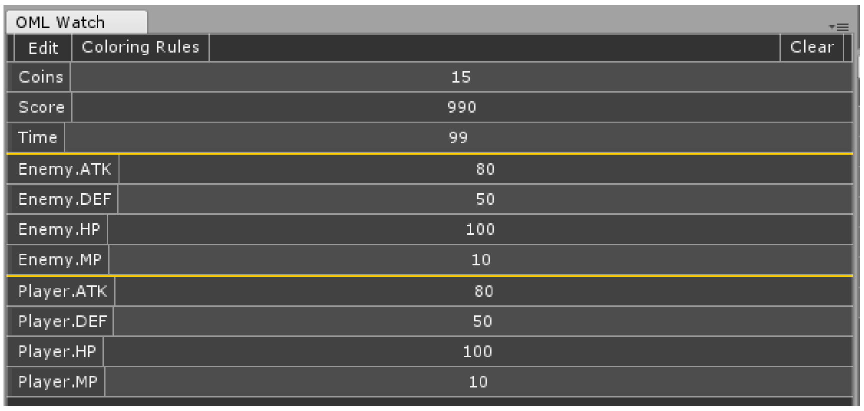
OML also supports convenient variable watching with log commands on a dedicated panel. Logs with the set-watch command won't get into the console view and help keep your log stream clean.

The watch panel also allows you to group related fields into a single row for a more compact and easy-to-read view.

Example.

Debug.Log("/set Coins=15");

Debug.Log("/set Player.ATK=80");

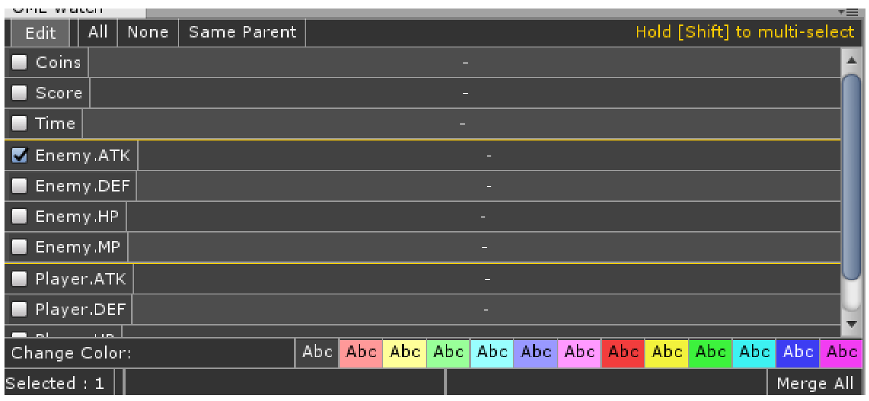


OML Watch

Edit | Coloring Rules | Clear

Coins	15
Score	990
Time	99
Enemy.ATK	80
Enemy.DEF	50
Enemy.HP	100
Enemy.MP	10
Player.ATK	80
Player.DEF	50
Player.HP	100
Player.MP	10

When Edit mode is turned on, you can select each data entry to change their color.



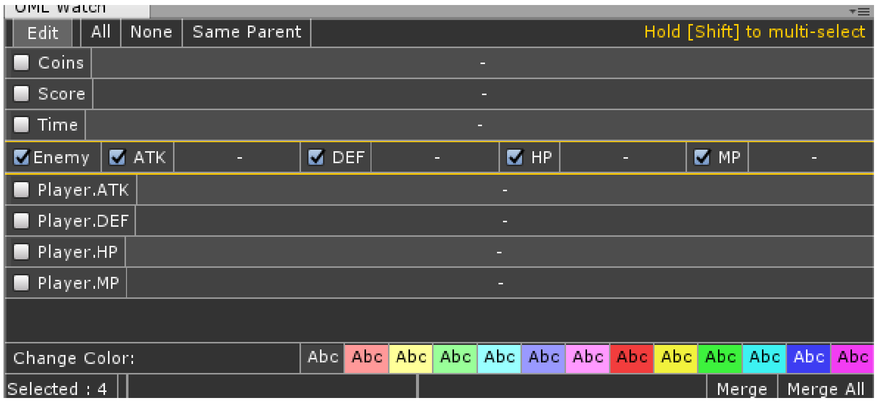
Edit | All | None | Same Parent | Hold [Shift] to multi-select

☐ Coins	-
☐ Score	-
☐ Time	-
☑ Enemy.ATK	-
☐ Enemy.DEF	-
☐ Enemy.HP	-
☐ Enemy.MP	-
☐ Player.ATK	-
☐ Player.DEF	-

Change Color: Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc

Selected : 1 | Merge All

You can also multi select them by shift click and merge them as a single row for a more compact view.

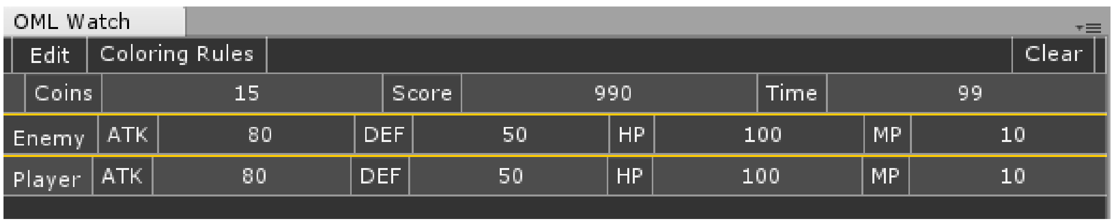


Edit | All | None | Same Parent | Hold [Shift] to multi-select

☐ Coins	-							
☐ Score	-							
☐ Time	-							
☑ Enemy	☑ ATK	-	☑ DEF	-	☑ HP	-	☑ MP	-
☐ Player.ATK	-							
☐ Player.DEF	-							
☐ Player.HP	-							
☐ Player.MP	-							

Change Color: Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc Abc

Selected : 4 | Merge | Merge All



OML Watch

Edit | Coloring Rules | Clear

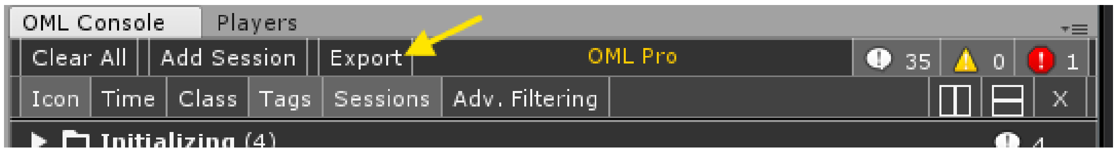
	Coins	15	Score	990	Time	99		
Enemy	ATK	80	DEF	50	HP	100	MP	10
Player	ATK	80	DEF	50	HP	100	MP	10

Exporting logs

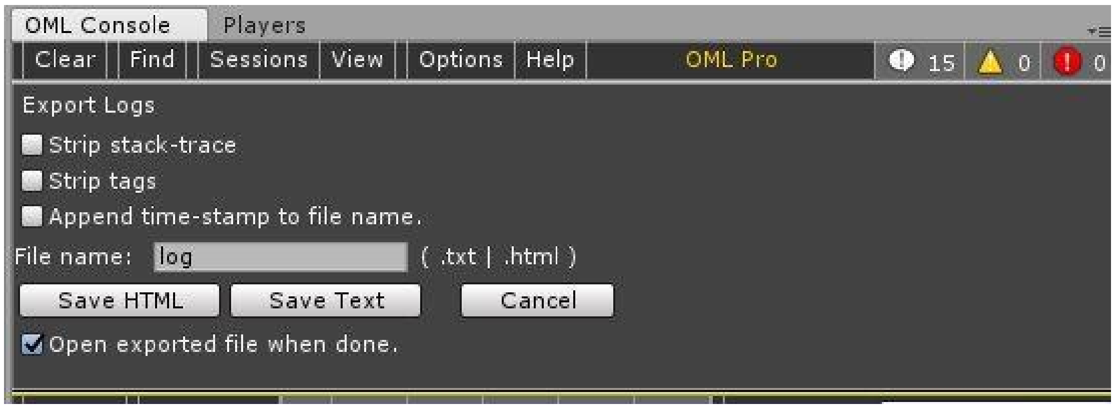
You can export logs to text file or HTML file

To export current logs,

1. Press hold down [Ctrl] key to bring out the [Export] button



2. Click the [Export] button to bring out export panel



Export Logs

☐ Strip stack-trace

☐ Strip tags

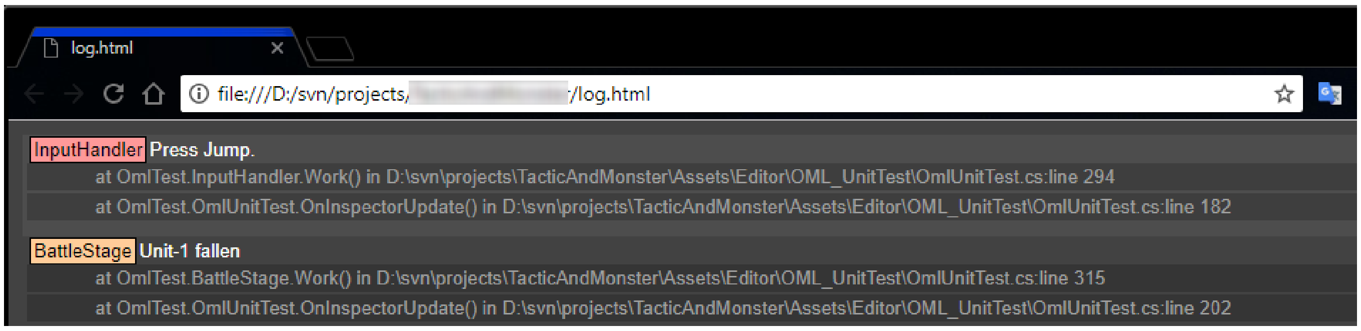
☐ Append time-stamp to file name.

File name: log (.txt | .html)

☑ Open exported file when done.

3. Press [Save HTML] or [Save Text] to start export

* file will be exported to Project Root directory.



```
InputHandler Press Jump.
        at OmlTest.InputHandler.Work() in D:\svn\projects\TacticAndMonster\Assets\Editor\OML_UnitTest\OmlUnitTest.cs:line 294
        at OmlTest.OmlUnitTest.OnInspectorUpdate() in D:\svn\projects\TacticAndMonster\Assets\Editor\OML_UnitTest\OmlUnitTest.cs:line 182
BattleStage Unit-1 fallen
        at OmlTest.BattleStage.Work() in D:\svn\projects\TacticAndMonster\Assets\Editor\OML_UnitTest\OmlUnitTest.cs:line 315
        at OmlTest.OmlUnitTest.OnInspectorUpdate() in D:\svn\projects\TacticAndMonster\Assets\Editor\OML_UnitTest\OmlUnitTest.cs:line 202
```

Sample HTML export with little coloring for better viewing experience

Thank you for your support.

If you found any bug, feel free to submit a bug report to me preferably with a direct email to omlconsole@outlook.com pointed from the asset store. Do not submit bug reports in the asset store review as I would not get notification from it.

You can also send me suggestions and do feature requests. I will implement it if your idea is good and practical and will benefit lots of OML users. Complex new features may take time to implement.

Don't forget to rate it from the Unity Asset Store.

(https://assetstore.unity.com/packages/tools/utilities/oml-console-pro-95949#reviews)

Enjoy~
Nick

Website: