




Pharo Status

Pharo Consortium Meeting

consortium-adm@pharo.org

8th December 2022

A stylized logo for Pharo 11. It features a central sun-like shape with a gradient from orange to yellow, surrounded by a blue semi-circle. Below this, a red, jagged, flame-like shape tapers downwards. At the bottom, a blue, wavy, ribbon-like shape extends downwards. Thin white lines radiate from the top of the logo.

Pharo 11 - Roadmap

- Keeping our same objectives:
 - Modularisation
 - Clean up
 - Improvements

**A mix of
Features and
Cleanings**



Pharo 11 - Initial Roadmap

- UI Issues (Monterrey / Linux / Windows)
- Stability
- Compiler Improvements
- Ephemerons / Image Initialisation
- Iceberg Improvements
- App Packaging / Better GTK Packaging
- Pakbot
- Graphics Improvements (Cairo, HDPI, Athens, Alexandrie, Roassal)...
- Window Manager (Multiple Windows)



Pharo 11 - Current Status

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WIP
INITIAL RESULTS



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IN PLAN

The Pharo logo is a stylized, colorful graphic on the left side of the slide. It features a central vertical element with a sun-like burst at the top, transitioning through orange, red, and purple to a blue base. The overall shape is reminiscent of a stylized 'P' or a flame.

Pharo 11 - Additional Improvements

- UI Speed / Memory Analysis and fixes
- Clean Blocks
- Constant Blocks
- Graph Scene Renderer (Beta soon...)
- Scalable Icons
- Refactorings Improvements
- GTK4



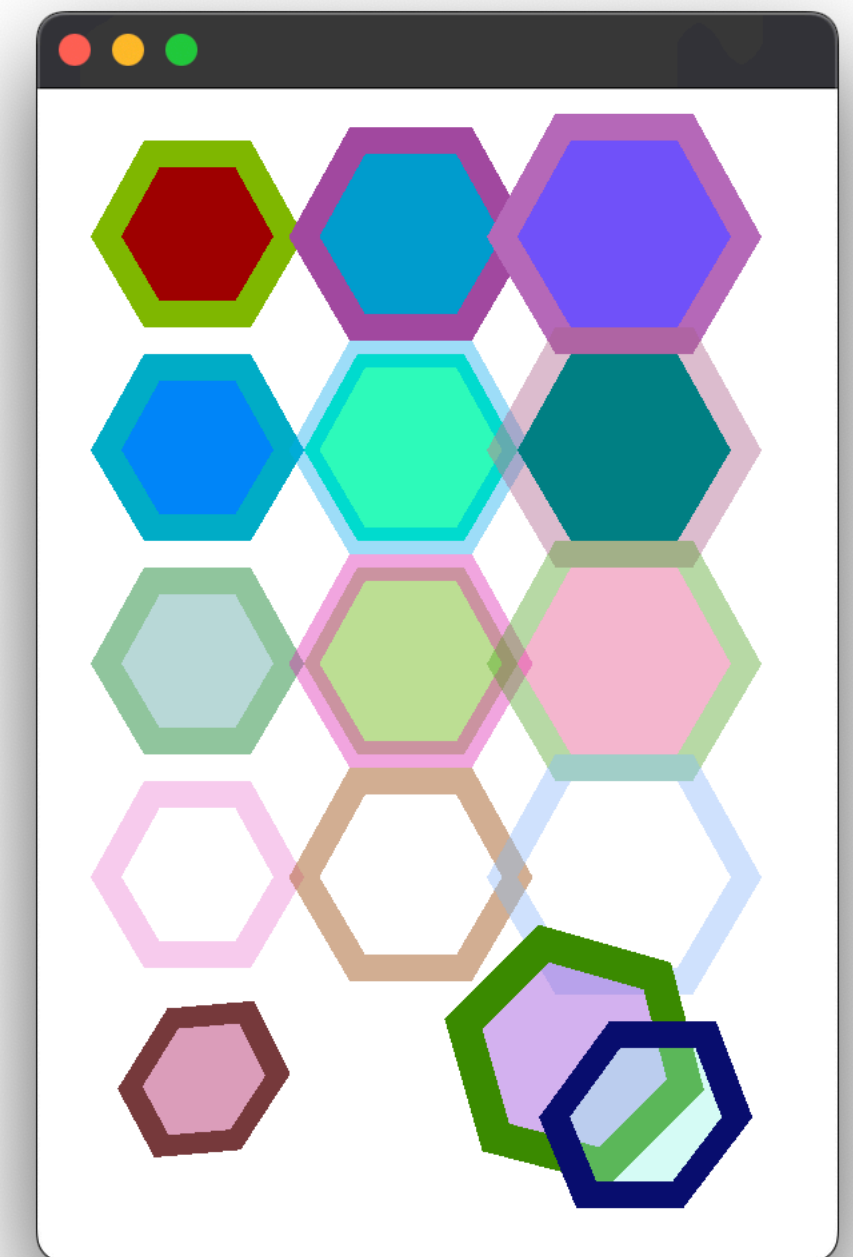
Bloc - Alexandrie - Cairo

Faster, Simpler, Cleaner

A clean library to be included in Pharo

- Make it easier to understand
- Have a clear maintenance process

Our code retrofits a part of the development made by feenk

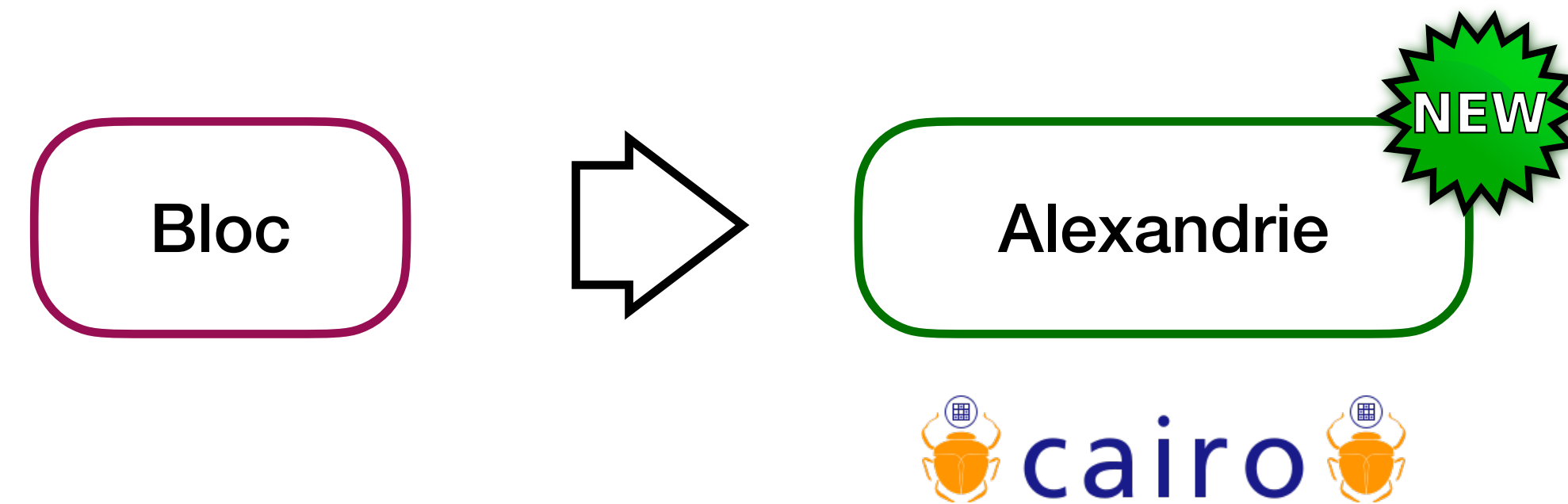


Bloc - Alexandrie - Cairo

Stay with simple FFI bindings to C libraries



- Works on all Pharo's platforms
- GPU acceleration
- Active gamer community
- Stable. Active gnome community (it's the way to draw custom widgets in gtk 3 and 4).
- Not GPU-optimized but we can use buffering, layer composition and other techniques to mitigate.



Call the C API smartly

Avoid redundant calls

Start by rendering Bloc elements
faster, then look for abstract API



Bloc + Alexandrie v1.0

- Support for most features of Sparta-Cairo, but fast.
- Doesn't depend on SurfacePlugin, like Sparta-Cairo, unlike Athens-Cairo
- Bloc v1.0 comes with Alexandrie, plus Sparta-Cairo and Sparta-Skia.
- Check it: <https://github.com/pharo-graphics/Bloc>
- Mailing list: <https://sympa.inria.fr/sympa/info/lse-openbloc>



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Version 1.0 Released



Bloc + Alexandrie Next

- Optimize transformations (this is Bloc level)
- Cache more Cairo objects
- Layer composition and Buffer unchanged elements
- Effects (blur, shadow)
- Bug in SVG path geometry
- Clear API (still not stable)

WIP
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WIP
INITIAL RESULTS

Possible by the support
of

THALES

The logo for Pharo VM is a stylized lighthouse. The top part is a semi-circle with a gradient from blue to orange, emitting several thin white lines representing light rays. Below this is a dark red, jagged shape resembling a lighthouse tower. A thick, wavy ribbon spirals down the side of the tower, transitioning from dark red at the top to blue at the bottom.

Pharo VM

- Updating Third Party Dependencies (Cairo, SDL, Libgit2)
- Perm Space
- GC Stability (Ephemerons, Weaks, Pinned Objects)
- SIMD initial support
- Cleaner, Smaller, Simpler...

The logo for Pharo VM is a stylized sun with a multi-colored face (blue, orange, red) and rays extending upwards. Below the sun is a red, jagged shape resembling a flame or a stylized 'P'. A blue and white wavy ribbon-like shape flows downwards from the red shape.

Pharo VM

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- SIMD initial support
- Cleaner, Smaller, Simpler...

**Under Initial
Alpha Testing**

The logo for Pharo VM is a stylized lighthouse. The top of the lighthouse is a semi-circle with a blue top half and an orange bottom half, emitting a bright orange starburst of light. The body of the lighthouse is a dark red, jagged shape. A blue and white striped spiral ribbon wraps around the lighthouse, extending downwards.

Pharo VM

PermSpace - Snapshots

- Adding a new Generation of permanent Objects
- New Image Format
- A fixed memory map
- Extensible to save more elements in the future:
 - Machine Code
 - Stack

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Pharo VM

PermSpace - Snapshots

- Objectives:
 - Faster GC (Perm Objects, less frequent)
 - Faster Load / Save (Direct Memory Mapping)
 - Discarding less elements of the runtime (Machine Code, Stack, etc)

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Possible by the support
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Pharo VM

PermSpace - Snapshots

- Beta Access
 - Converting images to the new format
 - New Image Format VM
 - PermSpace Support

<https://github.com/pharo-project/PermSpaceSupport>

<https://github.com/pharo-project/PermSpaceSupport/wiki/Using-Permanent-Space>

Possible by the support
of





Pharo Promotion Books

- Pharo with Style
- Pharo by Example 9

**Available for
Printing**

books.pharo.org



Pharo Promotion Mooc

- Revamp of the Pharo Mooc
- A new Advanced Mooc on the Works

mooc.pharo.org

A stylized logo on the left side of the slide. It features a sun-like shape at the top with rays, transitioning into a red, jagged, flame-like shape, which then flows into a blue, wavy, ribbon-like shape at the bottom.

Pharo Promotion

Mooc

- Revamp of the Pharo Mooc
- A new Advanced Mooc on the Works

**Downloadable,
Accessible,
Multiple Langs**

mooc.pharo.org

A stylized logo on the left side of the slide. It features a central sun-like shape with orange and yellow rays, surrounded by a blue and red circular border. Below this, there are three wavy, ribbon-like shapes in red, blue, and blue, stacked vertically. The entire logo is set against a background of thin, light gray lines radiating from the top left.

Pharo Promotion

- Books - books.pharo.org
- Mooc - mooc.pharo.org
- Blog - thepharo.dev

Thanks!!!

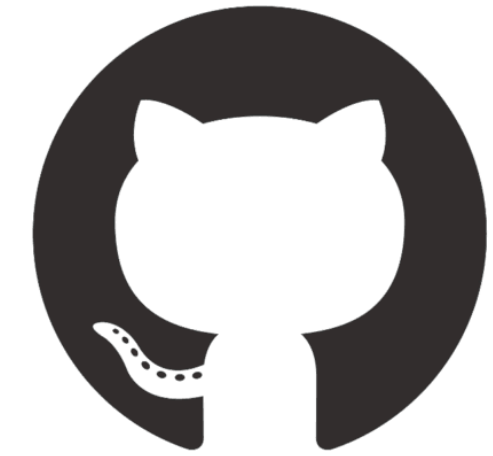


pharo.org



consortium

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[pharo-project/pharo](https://github.com/pharo-project/pharo)



discord.gg/QewZMZa



thepharo.dev