

The Practice Of Development "Walk Under Moon" Game



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Mobile Game Genres



Arcade



Adventures



Puzzle



Action



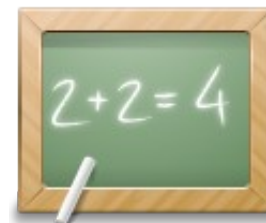
Sport



Cards and Casino



Strategy



Education



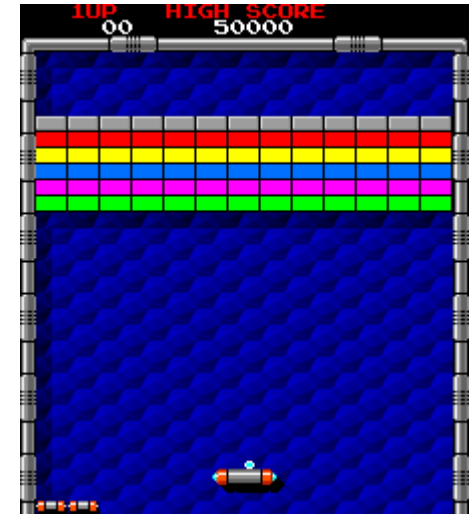
Classic games



Sonic

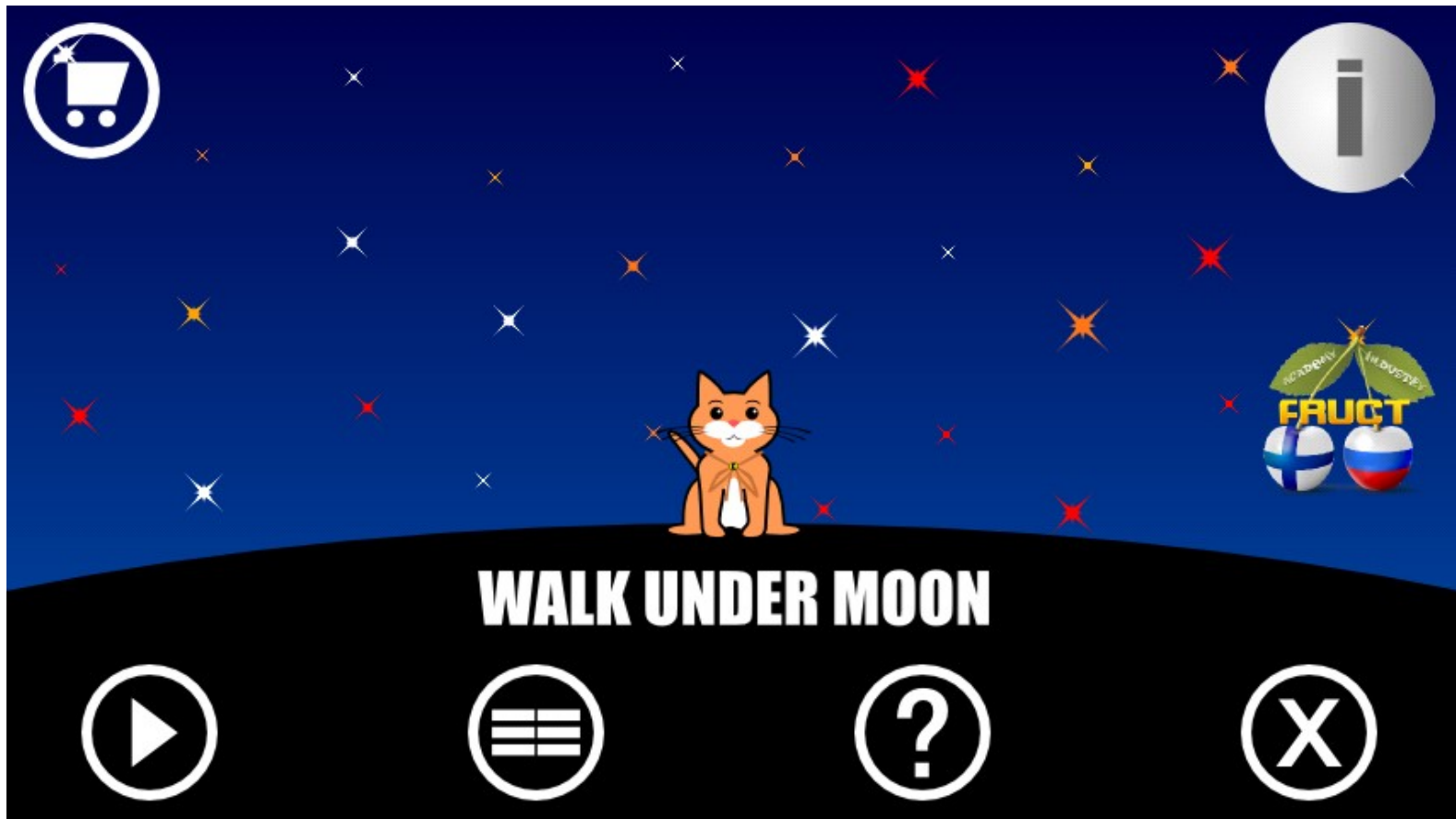


Pacman



Arkanoid

Walk Under Moon





Box2D

Box2D is a free open source 2-dimensional physics simulator engine written in C++ by Erin Catto and published under the zlib license.

Box2D QML plugin

This project aims to develop convenient **QML** bindings to the **Box2D** physics library.

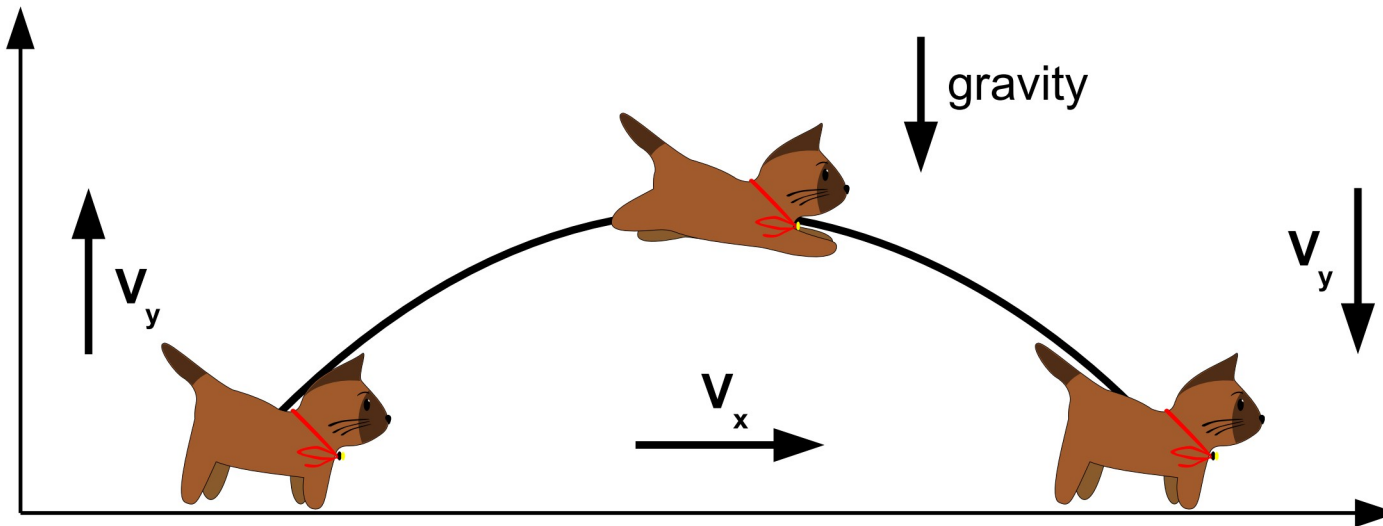
Since **QML** plugins are written in **C++**, the original **Box2D** code is imported and wrapped in **QObject** based classes.

URL: <https://gitorious.org/qml-box2d>



Physics

- Simple algorithm of jump

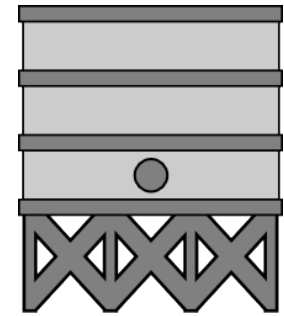


- Interaction with objects

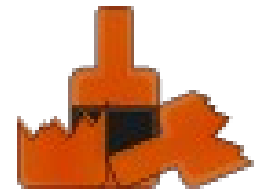
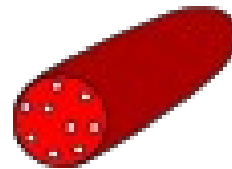


Generator

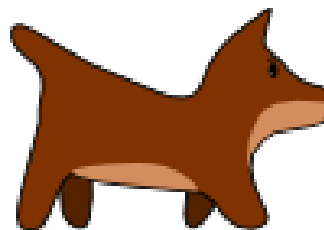
- Generator of objects



- Generator of bonuses

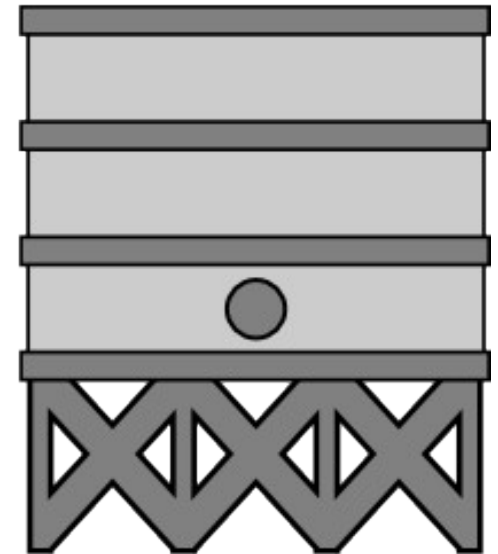
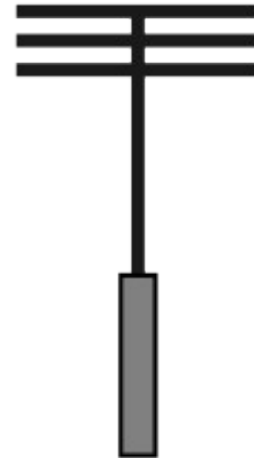
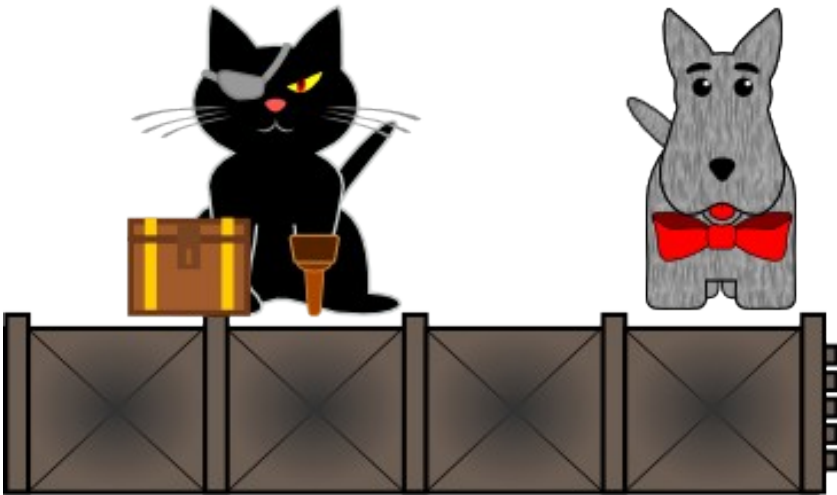
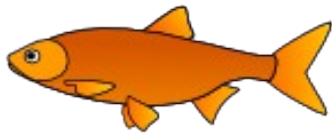


- Generator of enemies





Design





Animation

- Animation layers



- Gif animation





Design Tools

Inkscape is a vector graphics editor. Its goal is to implement full support for the Scalable Vector Graphics (**SVG**) 1.1 standard.

URL: <http://inkscape.org/>



GIMP (GNU Image Manipulation Program) is an image retouching and editing tool and is released under the **GPLv3** (or later) license as free and open-source software.

URL: <http://www.gimp.org/>





Development Environment

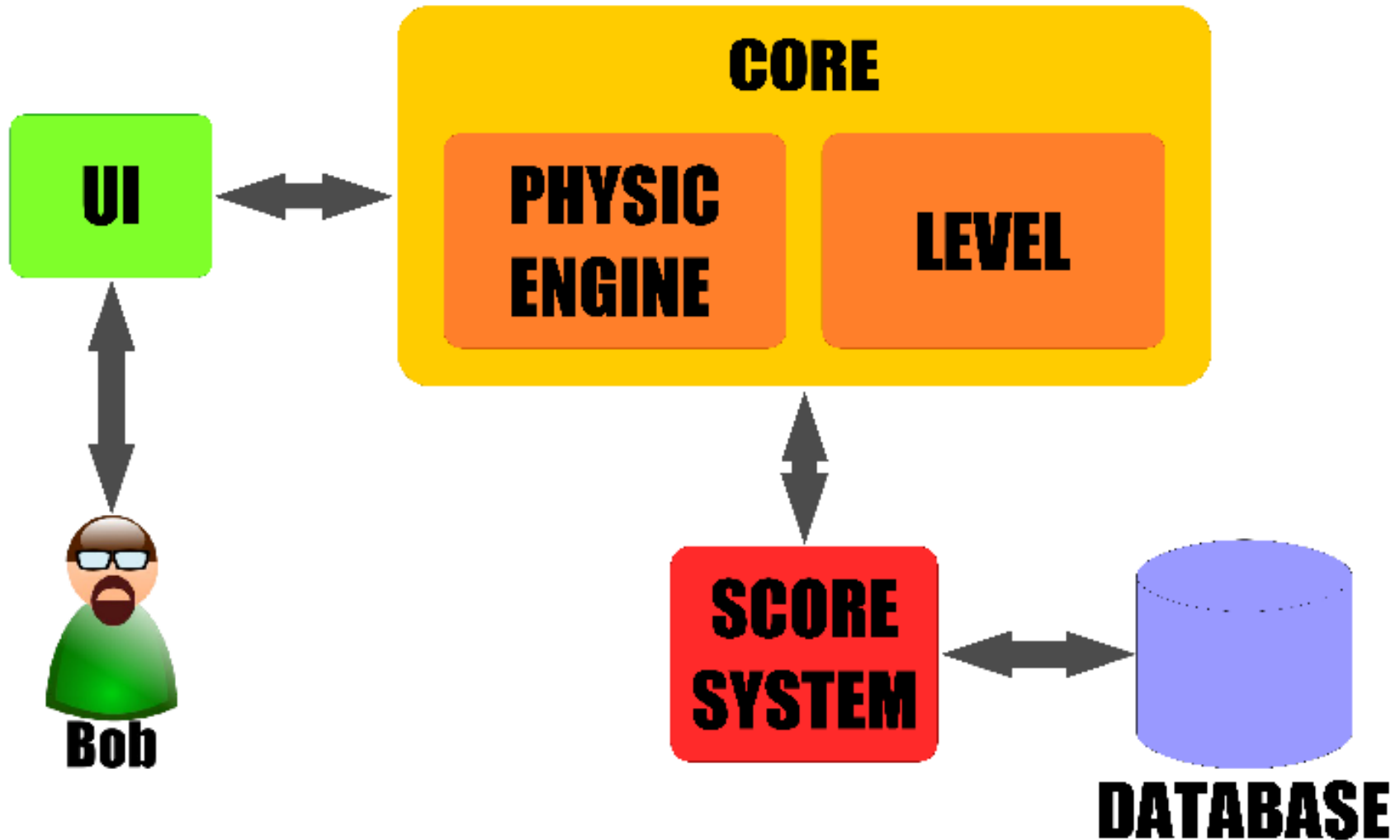
Qt Quick is a free software application framework developed and maintained by **Nokia** within the **Qt** framework. It provides a declarative way of building custom, highly dynamic user interfaces with fluid transitions and effects, which are becoming more common especially in mobile devices.

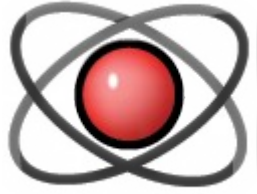
Qt Quick includes a declarative scripting language called **QML**.





Architecture





Core

Core of the application is responsible for the processing of data coming from the other modules. It includes following modules: **Physic Engine** and **Level**.

Physic Engine is responsible for the behavior of enemies, interaction with objects and the physics of a jump.

Level is a level generator.



Score System

Score System is a subsystem for accessing and working with **SQLite** databases.

SQLite is a relational database management system contained in a small **C** programming library.





Database

Database includes files that store records, the characteristics of all cats and game settings, which contain information about selected number of the cat and in-game money.



Characteristics



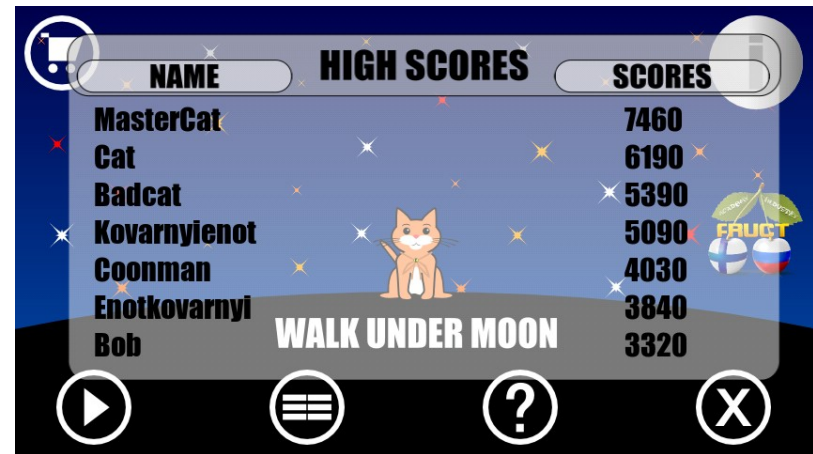
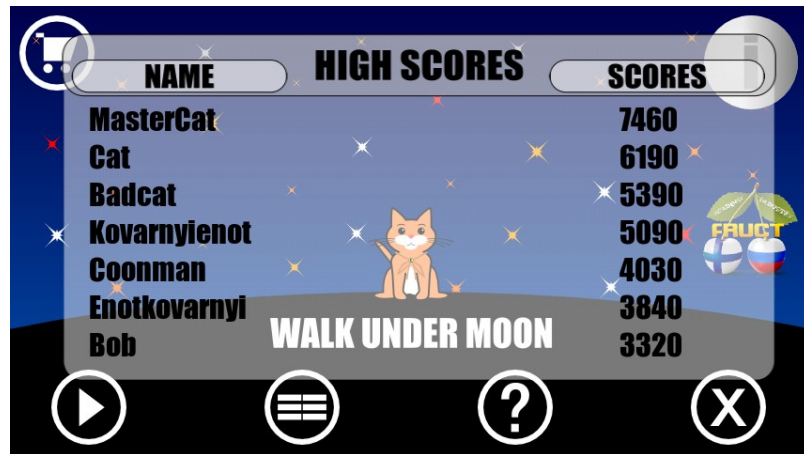
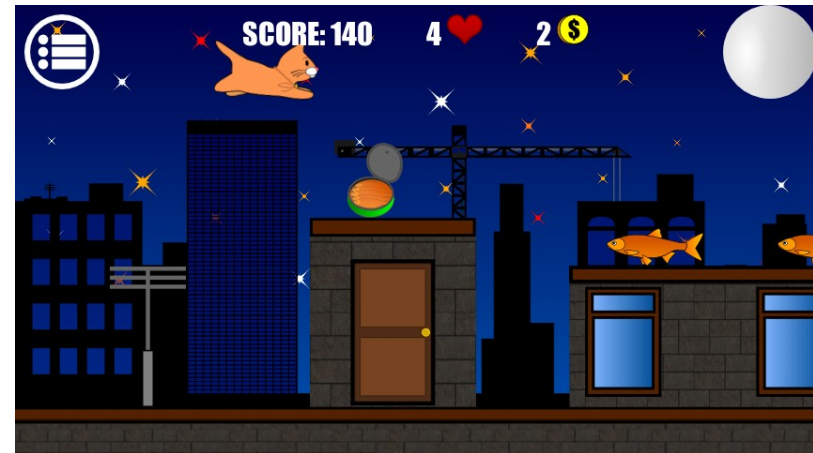
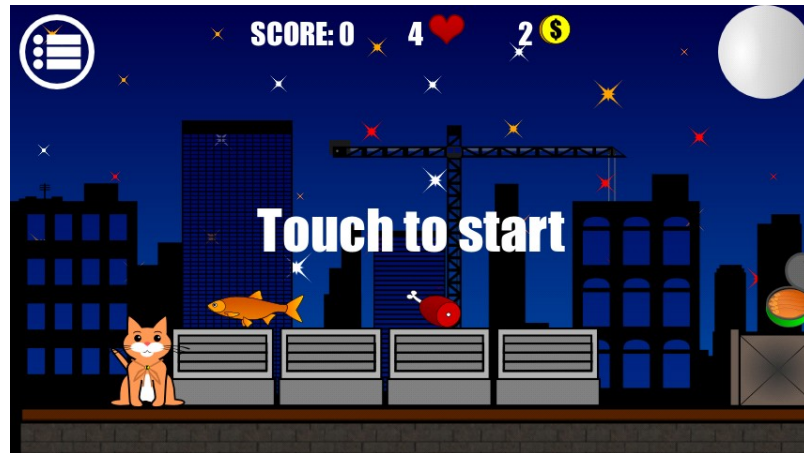
Settings



Records



User Interface



Game Versions



Walk Under Moon is a paid version of game. In this version of the game there is advertising.



Walk Under Moon + is a paid version of game. In this version of the game, cats have the ability.



Code Metrics

Modules	QML files (LOC)	JavaScript files (LOC)
PHYSIC ENGINE	1 (106)	–
LEVEL	–	2 (954)
UI	7 (1920)	–
SCORE SYSTEM	–	1 (436)



Nokia Store



Walk Under Moon downloaded 7241 times.

URL: <http://store.ovi.com/content/294114>



Walk Under Moon + downloaded 18 times.

URL: <http://store.ovi.com/content/296146>

Thanks for your attention