Rocket Crash

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Systèmes Embarqués Microprogrammés

- **ARM Processors**
  - ARM9 to control the two screens, the buttons and send IPC messages to the ARM7
  - ARM7 to control the sound, the touchscreen and buttons x and y

- **Timers / Interrupts**
  - TIMER 0: interrupt every 500ms to flash titles (Game pause, over)
  - TIMER 1: interrupt every 100ms to move the sky (BG1 main)
  - TIMER 2: interrupt every 333ms to move the obstacles (BG0 main)
  - TIMER 3: interrupt every 71ms to create and move cubes (Sprites)

- **Graphics**
  - Main Screen: mode 3 with backgrounds BG0, BG1 (Tiled) and BG3 (Ext. Rotoscale)
  - Sub Screen: mode 3 with backgrounds BG0 (Tiled) and BG3 (Ext. Rotoscale)

- **Sound**
  - Playing music (XM format) in a loop while in the main menu and stats
  - Playing multiple sound effects (WAV format) when using the keypad, the touch screen or while playing the game

- **Keypad**
  - Moving the sprite and pausing (Game play)
    - KEY_RIGHT / KEY_R = move sprite right
    - KEY_LEFT / KEY_L = move sprite left
    - KEY_START = pause game
  - Selecting options in the various menus (Game menu, pause, over, stats)
    - KEY_UP / KEY_DOWN = move selector up or down
    - KEY_A / KEY_SELECT = select option
    - KEY_B / KEY_X / KEY_START / (KEY_Y) = back or resume game (for Game stats)
  - Reading the keypad by polling

- **Touchscreen**
  - Moving the sprite using two positions on the touch screen (Game play)
  - Selecting options in the various menus with two or three positions on the touch screen (Game menu, Game pause, Game over, Game stats)
  - Reading the touch screen by polling

- **Secondary Storage**
  - Storing the four highest scores in a text file
  - Reading the four highest scores in a text file

NDS project screenshot

- **Include an image with the final view/s of your project on the actual NDS device**