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Model.h
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#ifndef MODEL
#define _MODEL_
#include <vector>
#include <time.h>
#include <SFML/Graphics.hpp>
#include "Constantes.h"
#include "AutonomousElement.h"
#include <fstream>
* "THE BEER-WARE LICENSE" (Revision 42):
* Antoine BOULANGÃM-^I & Pierre_Elliot CABRERA wrote this file. As long as you
retain this notice you
* can do whatever you want with this stuff. If we meet some day, and you think
* this stuff is worth it, you can buy me a beer in return
class MovableElement;
class Ninja;
class Model {
private:
 int _w, _h;
 int _hp;
 bool _damaged;
 int _score;
 int _money;
 bool_invincibility;
 DIFFICULTY _difficulty;
 bool _introduction;
 bool _menu;
bool _mort;
 bool highscore;
 bool _menuHighscore;
 Ninja * _ninja;
 std::vector<AutonomousElement *> _elements;
 std::vector<AutonomousElement *> elementsDeleted;
  std::vector<const AutonomousElement *> _newElements;
 std::vector<const AutonomousElement *> _newElementsDeleted;
 sf::Clock _clockBonus;
 sf::Clock clockObstacle;
 sf::Time _repopTimeObstacle;
 sf::Time repopTimeBonus;
 sf::Clock _clockInvincibility;
 sf::Clock clockFlv;
public:
 //Constructeur et destructeur
 Model(int w, int h);
 ~Model();
  //Accesseurs
 void getNinjaPosition(int &x, int &y) const;
 void getNinjaDimension(int &w, int &h) const;
 NINJA_STATUS getNinjaStatus() const;
 void getNinjaSpeedX(int &mvtX) const ;
 void getNinjaSpeedY(int &mvtX) const ;
 bool getNinjaToStopX() const;
 bool getNinjaToStopY() const;
```

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  int getNinjaToChangeDirection() const;
 int getHp();
 int getScore();
 std::vector<const AutonomousElement *> getNewAutonomousElements() const;
 std::vector<const AutonomousElement *> getNewElementsDeleted() const;
 std::vector<AutonomousElement *> getAutonomousElements() const;
 std::vector<AutonomousElement *> getElementsDeleted() const;
 bool getDamaged();
 bool getMenu() const;
 bool getDead() const;
 bool getInvincibility() const;
 LANGUAGE getLanguage() const;
 int getMoney() const;
 bool getHighscore() const;
 bool getIntroduction() const;
 bool getMenuHighscore() const;
 void setNinjaStatus(NINJA_STATUS value);
 void setNinjaDirection(bool forward);
 void setNinjaToStopX(bool toStop);
 void setNiniaToStopY(bool toStop);
 void setNinjaToChangeDirection(NINJA_CHANGE_DIRECTION newDirection);
 void setNinjaXBeginJmp(int value);
 void setNinjaYBeginJmp(int value);
 void setNiniaReduction(bool toReduce);
 void setMenu(bool menu);
 void setDead(bool mort);
 void setHighscore(bool highscore);
 void setIntroduction(bool introduction);
 void setMonev(int money);
 void setMenuHighScore(bool menuHighscore);
 //Méthodes
 void addScore(int value);
 void changeLife(int gain = 1);
 void addSpeed();
 void moveNinjaX(bool forward);
 void moveNinjaY(bool up);
 void stopNinja(bool abscissa);
 void nextStep();
 void addElement(bool obstacle);
 void clearNewElements();
 void clearNewElementsDeleted();
 void collisionNinia();
 void changeDamaged();
#endif
```