**Building**

# ParticleSystem m_smokeEffect
# sf::Texture m_smokeTexture
# sf::Vector2f m_position
# std::string m_name
# sf::Texture m_buildingTexture
# sf::Sprite m_buildingSprite
# sf::CircleShape m_placementRadius
# sf::RectangleShape m_healthBar
# sf::RectangleShape m_healthBarBackground
# int m_health
# int m_maxHealth
# int m_cost
# BuildingType m_type
# bool m_placementRadiusVisible

+ Building(BuildingType m_type)
+ virtual ~Building()
+ virtual void update(sf::Time t_deltaTime)
+ virtual void render(sf::RenderWindow &m_window)
+ void takeDamage(float m_damageAmount)
+ void setPosition(const sf::Vector2f &m_position)
+ sf::Vector2f getPosition()
+ int getCost() const
+ float getHealth() const
+ BuildingType getType() const
+ bool checkAffordability()
+ void setPlacementRadiusSize(float m_radius)
+ void setHealth(float newHealth)
+ const sf::Sprite & getBuildingSprite() const
+ const sf::Texture & getBuildingTexture() const
+ const sf::CircleShape & getPlacementRadius() const
+ void updateHealthBar()
# void initSmokeEffect()
# void spawnSmokeEffect()

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**AirCraft**

+ AirCraft()
+ ~AirCraft()
+ void update(sf::Time t_deltaTime) override
+ void render(sf::RenderWindow &m_window) override

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**Barracks**

+ Barracks()
+ ~Barracks()
+ void update(sf::Time t_deltaTime) override
+ void render(sf::RenderWindow &m_window) override

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**Headquarters**

+ Headquarters()
+ ~Headquarters()
+ void update(sf::Time t_deltaTime) override
+ void render(sf::RenderWindow &m_window) override

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**Refinery**

+ Refinery()
+ ~Refinery()
+ void update(sf::Time t_deltaTime) override
+ void render(sf::RenderWindow &m_window) override

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**WarFactory**

+ WarFactory()
+ ~WarFactory()
+ void update(sf::Time t_deltaTime) override
+ void render(sf::RenderWindow &m_window) override