

## End to End Manual Tests Based on Functional Requirements

### **Fire Station Destruction (FR\_VIEW\_TIMER, FR\_STATION\_DESTROY)**

This test is to test that the fire station gets destroyed

#### MAN\_DESTROY\_FIRESTATION

Open game

Close controls screen

Click start

If a timer and warning message about fire station destruction is displayed

    Wait Out timer

    If the firestation is destroyed and trucks can not be healed or refilled anymore

        Pass

Else

    Fail

### **Minigame Run Victory (FR\_ACCESS\_MINIGAME)**

This test is to test that the minigame can be played and won, and when this happens a victory screen appears

#### MAN\_MINIGAME\_WIN

Open game

Close controls screen

Click start

Use trucks to destroy all fortresses

If minigame launches

    Complete minigame and defeat the alien

    If a game over 'win' screen appears

        Pass

Else

    Fail

### **Minigame Run Loss (FR\_ACCESS\_MINIGAME)**

This test is to test that the minigame can be run and lost, and if you still have engines remaining you are returned to the main game and the fortress you just killed is respawned at low health so you can kill it again and re attempt the minigame.

#### MAN\_MINIGAME\_LOSS\_NOENGINES

Open game

Close controls screen

Click start

Use trucks to destroy all fortresses

Only have a single firetruck left to kill the final fortress

If minigame launches

    Lose Minigame

If a game over 'lose' screen appears  
        Pass  
Else  
    Fail

This test is to test that the minigame can be run and lost, and if you have no fire engines remaining you are taken to a game over losing screen.

#### MAN\_MINIGAME\_LOSS\_ENGINES

Open game  
Close controls screen  
Click start  
Use trucks to destroy all fortresses  
Have multiple engines left at end of game  
If minigame launches  
    Lose Minigame  
        If return to main game with one less fire engine and the final fortress to be killed will  
        respawn with a small amount of health  
            Pass  
Else  
    Fail

#### **Fortresses improving over time (FR\_WATER)**

A test to test that fortresses improve overtime.

#### MAN\_FORTRESSIMPROVEMENT

Open game  
Close controls screen  
Click start  
Wait out displayed improvement timer  
If fortress stats such as range, health, damage increase  
    Pass  
Else  
    Fail

#### **Patrols Spawning over time (FR\_PATROL\_INCREASE)**

A test to test that patrols spawn as the game is played not just at the start.

#### MAN\_PATROL\_SPAWN

Open game  
Close controls screen  
Click start  
Use trucks to kill a patrol  
Wait 10 seconds

If a patrol spawn

Pass

Else

Fail

### **Bomber following Truck to blow it up (FR\_PATROL\_SIGHT, FR\_AI)**

A test to test that patrols use AI to follow fire trucks in range, and if they can no longer see the truck then they use AI to path back to their old patrol path.

#### MAN\_PATROL\_FOLLOW

Open game

Close controls screen

Click start

Use truck to get within 4 tiles of bomber patrol

If patrol now follows truck until the truck gets 6 tiles away and then returns to its old patrol path

Pass

Else

Fail

### **Patrol causing damage to fire trucks (FR\_PATROL\_ATTACK,FR\_PATROL\_DAMAGE)**

A test to test that patrols can cause damage to fire trucks within their range.

#### MAN\_PATROL\_ATTACK

Open game

Close controls screen

Click start

Place truck in patrol path

If when the patrol is in range of the truck it attacks and deals damage

Pass

Else

Fail