#### Review of

### UAV Watchkeeper

### Produced by First Class Sim

The Watchkeeper is a V-tail, high winged, single engine, unmanned aerial vehicle built by the British Army by a joint venture company UAV Tactical Systems (U-TacS). It is designated WK450 and is based on the Israeli Elbit Hermes 450. The aircraft features a Wankel propeller engine that easily can push the IAS to the limit of 95 knots at sea level.

54 Watchkeepers are already ordered for delivery to the British Army for a total contract sum of £800 million which equals to an approximate unit price of £15 million. The mission that the Watchkeepers are built to fly is ISTAR missions, which is Intelligence, Surveillance, Target Acquisition and Reconnaissance missions.

The fuselage is 6,10 m long and the wingspan is 10,50m. The MTOW is 450kg with a payload of 150kg and the Watchkeeper is built for flying for 14-16 hours or more depending on the given circumstances. The service ceiling is limited to 16,000 ft due to the engine and the max IAS is 95 knots at sea level while the cruise IAS is 75-90 knots at 13,000 ft. Total range is 150km without satellite covering.

## Specs:

- Produced by U-TacS
- First flight *April* 2008
- Introduction 2011
- Role ISTAR aircraft
- Status Active
- Built 54+
- Unit costs £15 million (2011)
- Primary user
  - o The British Army



I downloaded this add-on aircraft from FSPilotShop and the download went quickly and with ease – the download file is just about 76Mb. The installation was also as I expected very quick and easy. I just activated the installation wizard and after only a few seconds the complete add-on was installed and ready for flight. The installation wizard is very user friendly and you do not need to do anything manually – everything is done perfectly and automatically.

After the download was finished I opened my FSX folders to verify that the installation was completed correctly and of course it was – I found the Watchkeeper perfectly placed in the correct FSX library folder.

Hereafter I opened up my FSX and went into my virtual hangar to check the installation and the liveries. The Watchkeeper was perfectly placed in the library of First Class Sim together with a second extra add-on that I discovered was also included in this download. The extra add-on was the Predator UAV which I was quite surprised about since I did not expect it. There were in total 5 liveries for the predator but only 2 liveries for the Watchkeeper. This I found to be a bit strange since the add-on was named UAV Watchkeeper, but never mind I now had the pleasure of trying out both UAVs.

The add-on can be installed for both FSX and FS9 but in this review I have only tested the FSX version.

I started my test with an external walk around the Watchkeeper. The model is very well made and features custom animations as wheels turning, control surfaces and propeller animation together with a huge number of specific details that I could verify from pictures of the real Watchkeeper. The textures used are of good quality, the finish is super and the paint scheme is very realistic. Allin all a very well made model that resembles the real aircraft spot-on.

Real



First Class Sim



Now I changed the view to be the Predator UAV instead and went for a walk around the aircraft. This aircrafts also do resemble the real version quite well and features custom animations as the Watchkeeper but also gear up/down and flexible wing animation. The textures used are okay but the model is lacking finish and realism. I am sorry to say but the Predator model is below what can be expected for a payware add-on.

# The Watchkeeper







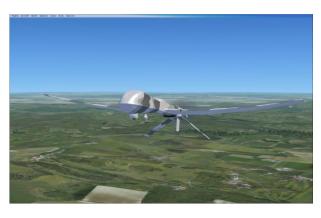


The Predator









I continued my test and went "inside" the aircraft to get a view of the cockpit. This was of course not into the aircraft but into the container where the UAVs are controlled from. Both these aircrafts are unmanned aircrafts meaning that the pilot is like a PC pilot flying a RC-like aircraft at a larger scale. This I was very excited to try out because that should resemble being a PC pilot and flying in front of a computer screen with your joystick, throttle etc.

Entering the container I discovered that First Class Sim had included both a 2D cockpit and a virtual cockpit. I started with the 2D cockpit which was more or less just a close-up of the nose camera screen with flight information. Flying the aircrafts like this was indeed a challenge at first but like they say "Practice makes perfect" and so it was – after spending a few hours learning to fly the Watchkeeper like this I finally got the hang of it.

The idea of flying like this was scary because I had trouble navigating and finding my right position according to where I wanted to be. I couldn't just turn my head to verify a direction, I now moved the camera and hereby the entire image which I really had to get used to. The quality of the flight information used at the 2D cockpit was below my expectations unfortunately but I did like the visual effect of being a "missile" flying towards the target.









I now turned my focus on the virtual cockpit which was the physical inside of the container. This was again very different from what I am used to fly but of course the right way for this add-on. The inside of the container was fully created from chair to flight control panels etc which made a complete experience of the virtual cockpit.

There are indeed included a lot of details and the textures used are good quality, the finish is not great but decent and the depth experience is good. First Class Sim has really tried to create a very realistic environment and they have also done so – however using the virtual cockpit was more or less impossible. The nose camera screen was extremely small, so I had to change the view settings on my head tracker to zoom in on only the camera screen. This resulted in absolutely no usage of the rest of the virtual cockpit and gave me a not too impressive experience of this add-on.







The sound set used is fair – I couldn't find any sound files from the real Watchkeeper so I cannot verify how real it truly is or is not. The sound I do believe fits the model and could very well be

realistic. I tested the sound set in both stereo, 2.1 and 7.1 surround sound and found no issues at all – no problem by switching to full surround sound.

In regards to the flight dynamics then I have never tried to fly either a Watchkeeper or the Predator in real life, however I do believe the models are acting quite realistic in accordance to the few specifications that I could find on the internet of these two UAVs.

My conclusion for the UAV Watchkeeper from First Class Sim is that this add-on is a very well made model which a huge number of specific details, a nice paint scheme, fair animations and a good finish. The model is very realistic all-in all but when looking towards the 2D and the virtual cockpit and the complete Predator add-on, then this was indeed below my expectations for a payware add-on. I have seen several freeware add-ons of a higher quality and therefore I cannot rate this add-on with more than 2.5/5-Stars which is below payware level of minimum 3 stars.

I did enjoy the experience I got flying the UAV Watchkeeper and I of course thank First Class Sim for contributing to the flightsim community with this very special add-on. Not many models of UAVs have been made for flight simulator, so if you are a fan of this way of flight, then this is an add-on that you should try out.

# Rays Aviation



