

DCIM and Flying at 33,000 Feet

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Introduction

I was fortunate enough to be flying home from a week's holiday in Cape Verde recently. Whilst sat in my, not so comfortable, seat for over 6 hours, as many people do, I found myself staring at the in-flight statistics, which are invariably displayed on the overhead or back seat TV screens.

Little appears to change flight statistics wise over a short period of time, despite mentally willing the aircraft icon further towards the UK on the map. Once the statistics re-appear after an in-flight movie for example, it's clear that we have made significant progress as far as reaching our destination.

Firstly, I'd like to state that I'm not a pilot nor have I ever had any flight training, however, looking at these statistics such as Current Position, Altitude, Air Speed, Outside Temperature and Current Direction/Compass Heading during my recent flight, is still very interesting regardless.

Whilst these statistics are purely of passing interest to a weary sun burnt traveller like myself, this information would no doubt be of critical importance to the pilot and his/her crew, and I'm positive they would want to be aware of any minor changes in these figures, as well as a myriad of other statistics of course.



How does DCIM link?

I imagine these statistics would usually be displayed via multiple screens and instrument clusters. Linked to numerous sensors throughout the aircraft. This is what ultimately led me to consider comparisons to DCIM.

DCIM - "Data Centre Infrastructure Management, commonly referred to as DCIM, is a term which refers to a collection of technologies and products, which work together to assist data centre operators, with the management, running and cost calculation of their facility".

A Data Centre Manager, much like a pilot, requires real time information on their own facility. Information such as temperature, humidity, power usage and capacity, as well as information on the UPS and generator. Similarly to the pilot, the Data Centre Manager, would also want to know of any alerts, alarms or threshold breaches from various sensors and managed devices throughout the facility. This information should be critical to the data centres operation.

Another comparison would be whilst the data centre statistics may also seem to remain fairly constant in some instances, things can change over a relatively short period of time without anyone being necessarily aware of it without trending and the ability to use this information to produce detailed analytic reports.

Many other similarities begin to appear, even down to the air crew having a detailed passenger manifest, containing information such as passenger names, what seats they were allocated, which passengers have specific dietary requirements, right down to who's paid in advance for their duty free alcohol and cigars.



This could also be compared to asset management and tracking within a data centre.

- What are asset names?
- Which rack are they located in?
- Which assets have specific power requirements?
- Which assets are due to be serviced or replaced?

Surely a pilot wouldn't consider leaving terra firma without a full complement of functioning instrumentation; at least I'd prefer to think so. Without it, the pilot would be flying blind and not necessarily be aware of the critical readings throughout the aircraft's internal and external environment, with possible catastrophic results.

Then surely a Data Centre Manager responsible for the operational efficiency and uptime of his facility requires a high degree of Data Centre specific information, which must be readily available and displayed in an easy to understand fashion. As with pilots, operators of the DCIM platform

would require training in order to fully interpret the information available and then act upon it correctly.

There are numerous more **Aircraft to DCIM** comparisons;

Aircraft – How much fuel do I have, and how far can I fly before I run out?

DCIM– How much generator fuel do I have, and how long will it run for?

Aircraft – Current and anticipated weight and capacity of the hold, with luggage/suitcases individually recorded.

DCIM– Current and anticipated weight and capacity of racks, with individual recorded asset details.

Aircraft – Aircraft inspection, repair and maintenance logs.

DCIM– Inspection and maintenance records with work order control.

Whilst I could keep going, the point is – are you flying blind with regards to managing and operating your critical environment or would it be beneficial to upgrade to a fully functioning DCIM platform?



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