

## Chapter 3 – REPRESENTATIVE NATO CORROSION POLICIES (UNITED KINGDOM)

### UK MILITARY AIRCRAFT CORROSION DATA GATHERING AND EXPLOITATION

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UK MOD TES-MIG

Corrosion Control And Aircraft Husbandry

**TES** Technical  
Enabling Services

**DPA DLO**  
Working together to deliver capability

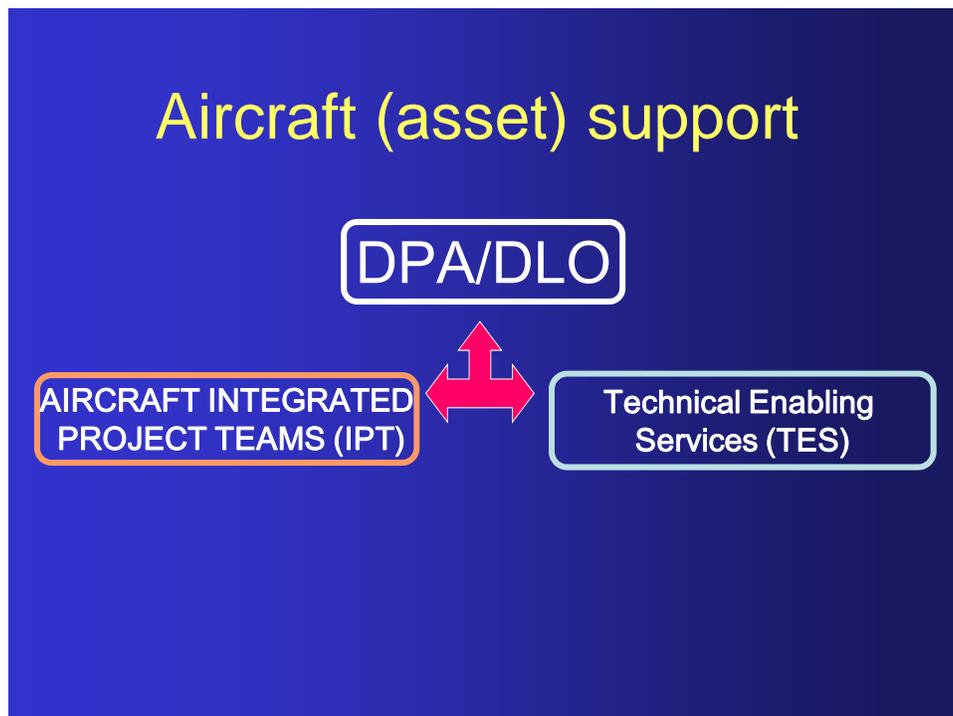
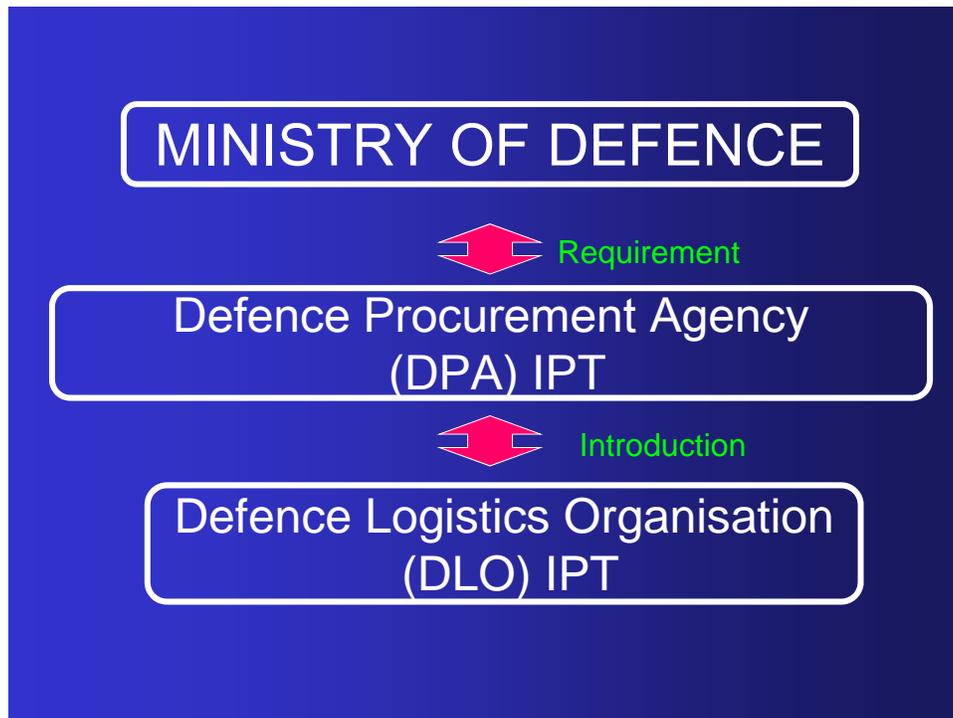
### OBJECTIVE

- To present an perspective of data gathering for corrosion incidents on UK military aircraft and the methods used to exploit this data to reduce the incidents on aircraft fleets.

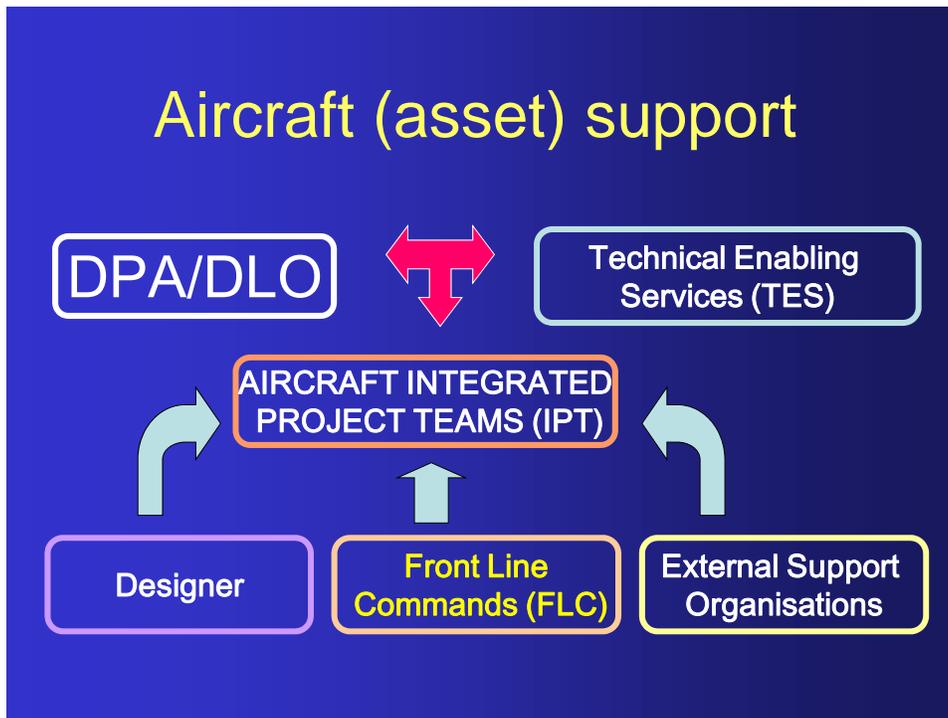
## Contents

- Structure of MOD asset support
- Data collection
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- Summary
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## Structure of UK MOD Asset Support



## Aircraft (asset) support



## MOD structure

- IPTs/Owners
- TES/advice & policy
- FLCs/Operators
- Extrenal Advice (and Depth Organisations)

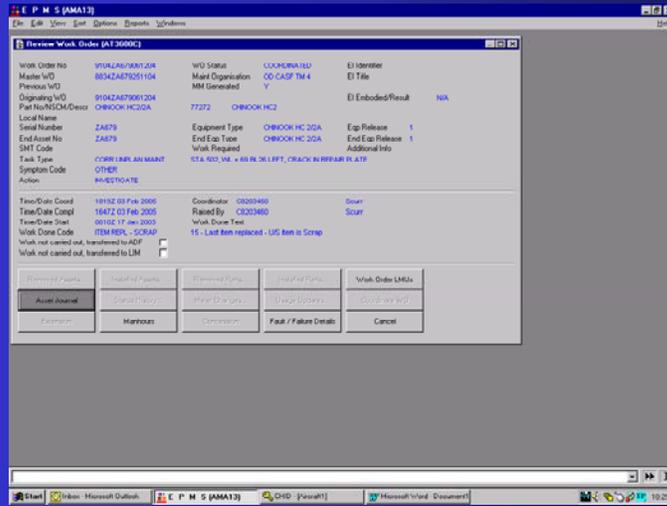
## Data Collection

### How UK MOD/RAF collect

- Job cards
- Aircraft Maintenance Records

# REPRESENTATIVE NATO CORROSION POLICIES (UNITED KINGDOM)

## What is collected now

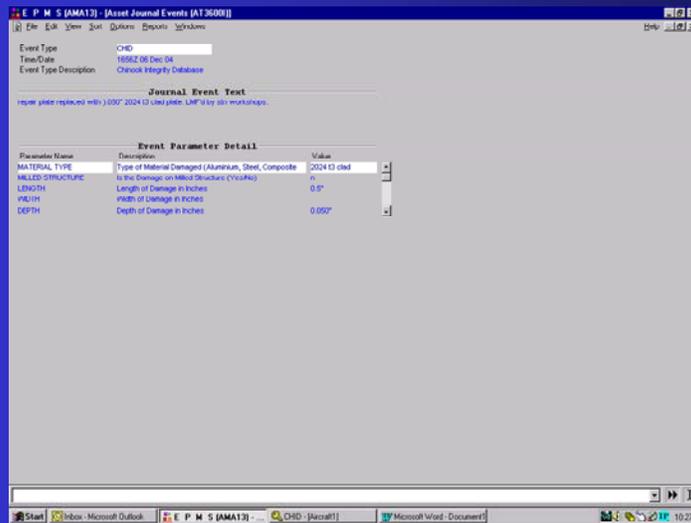


**E P M S (AMAI3) - Review Work Order (AT 36002)**

Work Order No	976124517667244	WO Status	WORKING	E Identifier	
Master WO	86342472051104	Matl Organization	00-CASF TM 4	E Title	
Originating WO	816424570661204	MM Generated	Y	E Embodied/Result	N/A
Part No./NSOM/Desc	CHROOK HC20A	77272	CHROOK HC2		
Local Name		Equipment Type	CHROOK HC 22A	Eg Release	1
Serial Number	Z4879	End Egp Type	CHROOK HC 22A	End Egp Release	1
End Asset No	Z4879	Work Required	ICSA 902, IM + 9016, 9017, CRACK IN REPAIR AREA	Additional Info	
SMT Code		Symptom Code	OTHER	Action	INVESTIGATE
Time/Date Coord	1814Z 03 Feb 2005	Coordinator	0303480	Source	
Time/Date Compl	1647Z 03 Feb 2005	Raised By	C320480	Scout	
Time/Date Start	0610Z 07 Jan 2005	Work Done Text	15 - Last item replaced - US item is scrap		
Work Done Code	ITEM REPL - SCRAP				
Work not carried out, transferred to ASF	<input type="checkbox"/>				
Work not carried out, transferred to LIM	<input type="checkbox"/>				

Buttons: [Previous Pages] [Initial Pages] [Previous Page] [Next Page] [Work Order LMI's] [Asset Journal] [Serial History] [Other Data] [Usage Updates] [Go to the end] [Exception] [Markings] [Comments] [Fault / Failure Details] [Cancel]

## What may be collected



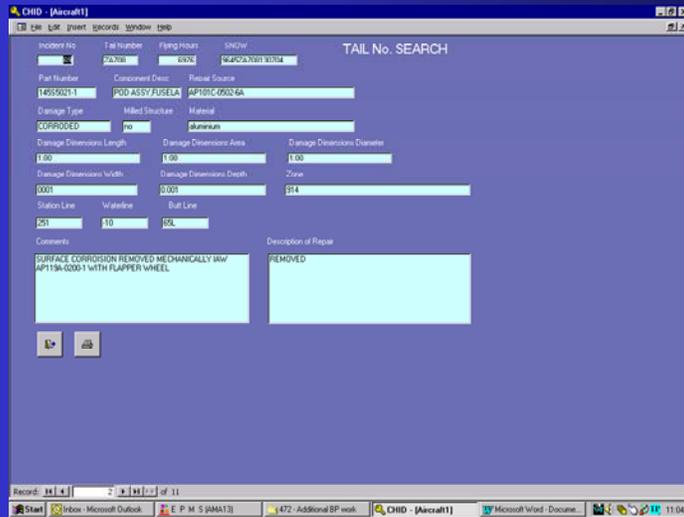
**E P M S (AMAI3) - Asset Journal Events (AT 36002)**

Event Type: CHD  
 Time/Date: 1850Z 06 Dec 04  
 Event Type Description: Check Integrity Database

**Journal Event Text**  
 repair plate replaced with 3.007' 2024 G3 lined plate. LMI's by 601 workshp.

Parameter Name	Description	Value
MATERIAL TYPE	Type of Material Damaged (Aluminum, Steel, Composite)	2024 E3 clad
MILLED STRUCTURE	Is the Damage on Milled Structure (Y/N/A)	N
LENGTH	Length of Damage in Inches	0.5"
WIDTH	Width of Damage in Inches	
DEPTH	Depth of Damage in Inches	0.050"

How can be searched



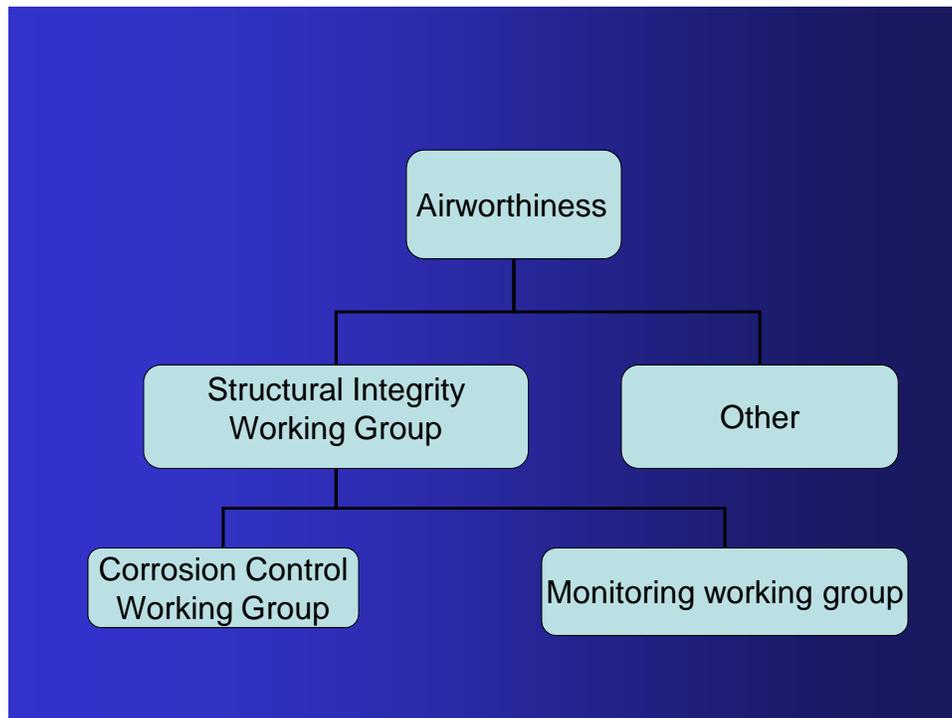
So, in the main:



## The Review Process

### IPT role

- Availability of asset to Front Line Command (FLC)
- Maintain effectiveness of platform
- Through life costs
- Maintain airworthiness



### CCWG

- CCWG owned by IPT individuality of approach
- All:
  - TES-MIG, TES-ASI, NDT,
- Some:
  - FLC, aircraft specific training delivery organisations, Aircraft designers, other support organisations (SME), depth organisations
  - Unit corrosion control post

Exploitation mainly consists in:

Review of data and corrosion incidents leads to

- Corrosion Control Plan detailing individual components, issues and processes
- Specific Plans
  - (eg Magnesium replacement programme)
- Feedback to policy training and central support organisations
  - Pan-platform overview

Policy

## Policy

### JAP 100A-01

Present corrosion policy is detailed in JAP

#### Chapter 11.6 Aircraft Corrosion Control

“MoD policy is, therefore, to discourage the onset of corrosion in the first place and, when it does occur, to ensure that it is speedily recognised and contained.”

## Policy

### JAP 100A-01

Future policy following Tri-annual review

#### Chapter 11.6 Aircraft Environmental Damage Prevention and Control

Recognises Corrosion as the primary ED mechanism:

“MOD policy is, therefore, to discourage the onset of corrosion in the first place and, when it does occur, to ensure that it is speedily recognized and contained.”

## Policy

### JAP 100A-01

#### Chapter 11.6 Aircraft Corrosion Control

“IPTs are to establish a means of detecting and tracking trends in corrosion arising across the fleet, to support decision making for Structural Integrity (SI) and through-life management”

## Future policy

### JAP 100A-01

#### Chapter 11.6 Aircraft Environmental Damage Prevention and Control

“IPTs are to produce and maintain a Corrosion Control Plan (CCP). The CCP is a living document used by the IPT to highlight current corrosion issues, proposed solutions and details of prevention and control initiatives ”

## Policy

### JAP 100A-01

#### Chapter 11.6 Aircraft Corrosion Control

“... where IPTs consider corrosion to be a significant problem for the platform, FLCs are to direct ship/station/unit engineers of authority level K to establish a unit corrosion control post for a Senior Rate/SNCO”

## Future policy

### JAP 100A-01

#### Chapter 11.6 Aircraft Environmental Damage Prevention and Control

“... However, where IPTs consider corrosion to be a significant problem for the platform, FLCs are to establish for each Stn/Ship/Unit a corrosion control post for a Senior Rate/NCO, ”

