

# **IMPACT OF GROUND HANDLING ON AIR TRAFFIC VOLATILITY**

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# ON TIME PERFORMANCE IN HANDLER'S HIERARCHY

**SAFETY**



**ON TIME PERFORMANCE**



**OTHER QUALITY INDICATORS**



# COMPLEXITY OF HANDLING OPERATIONS

VARIOUS SERVICES

SLA'S

STAFF

GSE

VARIOUS SERVICE PROVIDERS

**HANDLING**

VARIOUS PARTIES INVOLVED

REGULATIONS AND PROCEDURES

AIRPORT INFRASTRUCTURE





# WHAT INFLUENCES ON TIME PERFORMANCE?

## STRATEGIC LEVEL

- REGULATIONS
- SLA'S
- AIRPORT INFRASTRUCTURE DECISIONS

## TACTICAL LEVEL

- SCHEDULE AMENDMENTS
- NEW PROCEDURES / AMENDMENTS

## OPERATIONAL LEVEL

- DELAYED ARRIVAL OF AIRCRAFT
- DELAYED SERVICES BY OTHER PROVIDER
- DECISION OF AIRPORT AUTHORITY
- AIRLINE DECISION
- HANDLER INTERNAL PROBLEM
- ADVERSE WEATHER CONDITIONS





# CURRENT TRENDS IN HANDLING OPERATIONS

- DYNAMIC EVOLUTION OF AIRLINE BUSINESS MODELS:
  - REQUIREMENTS FOR THE SHORTEST POSSIBLE TournAROUND TIME
  - DYNAMIC CHANGE IN PRODUCTS
  - COST PRESSURE
  - INCREASE IN AVERAGE AIRCRAFT CAPACITY
- CONGESTION ISSUE



# DELAYS CODES ISSUE

- VARIOUS CODES APPLICABLE TO GROUND HANDLING OPERATIONS
- DIFFERENT SYSTEMS AMONG AIRLINES
- PROBLEM OF CODES ASSIGNMENT
  - DIFFICULTY WITH CODE IDENTIFICATION
  - ASSIGNMENT OF CODES TO OTHER STAKEHOLDERS



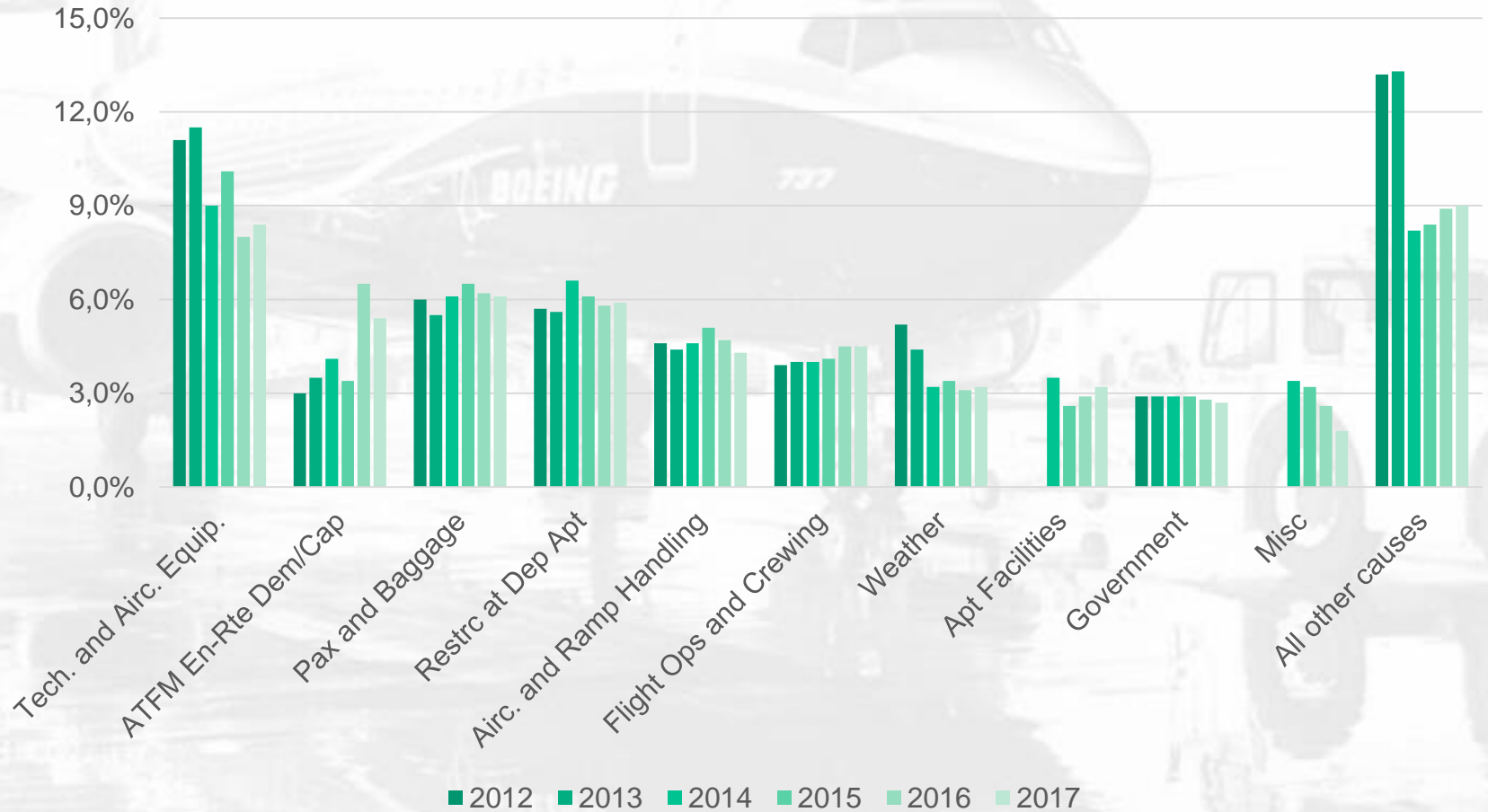


# UNIVERSAL IATA AND EUROCONTROL/CODA DELAY CODING

- PRIMARY VS. REACTIONARY CAUSES (CA. 55 TO 45 PER CENT)
- PRIMARY DELAY CODE GROUPS:
  - AIRLINE (INCL. AIRCRAFT AND RAMP HANDLING)
  - AIRPORT
  - EN-ROUTE
  - GOVERNMENTAL
  - WEATHER
  - MISC



# SHARE OF DELAYS BY CAUSES (%)

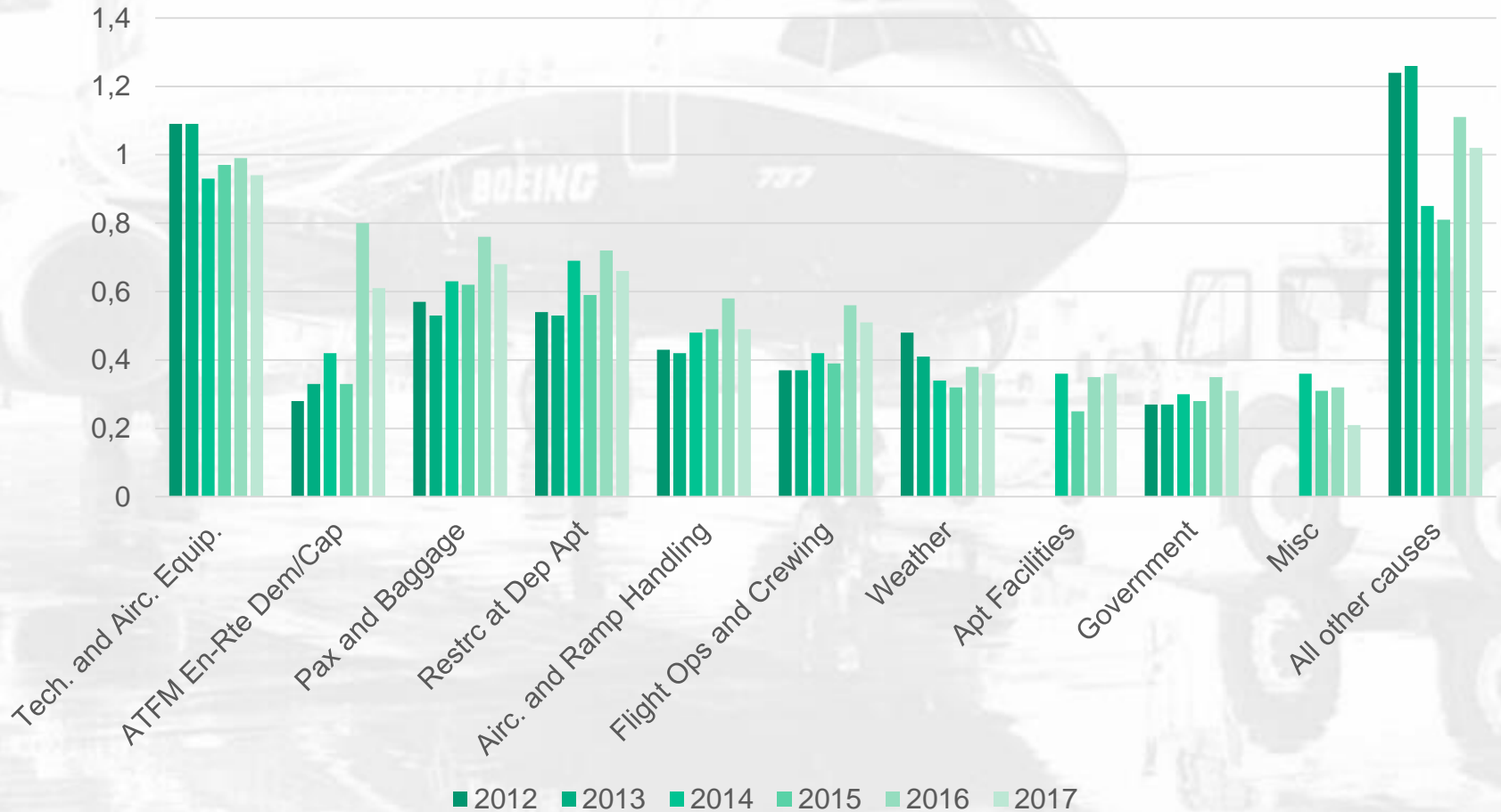


Source: Eurocontrol/CODA.





# AVG DELAY PER FLIGHT IN MINS BY CAUSE



Source: Eurocontrol/CODA.



# TACKLING DELAYS

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- COLLABORATIVE DECISION MAKING BY ALL STAKEHOLDERS (AIRPORT & AIRCRAFT OPERATORS, GROUND HANDLERS, ATC AND THE NETWORK MANAGER)
- GROUND SERVICE PROVIDER FLEXIBILITY
- RESOURCES PROVISION



**THANK YOU FOR ATTENTION!**

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