

# ZITTEL PAGA TRAINING (course 1)

## Introduction to Zitel ZEST PAGA Training course

*An introductory training course aimed at project engineers, commissioning engineers and maintenance personnel.*

Covers the need for PAGA, basic operational requirements, compliance with standards, system architecture, microphone access, interfaces to other systems, amplifiers, loudspeakers and flashing beacons

Delivered by John Blach ZEST Zitel design team

### **Agenda**

#### **Hazardous Area Training - an introduction**

##### **Day 1**

###### **Morning**

Introduction to PAGA  
History  
Major Components  
Architecture

###### **Afternoon**

Explosion proof concepts  
Installation and maintenance  
Exam

Information is delivered in a structured but informal manner with question / answer sessions encouraged throughout the presentation.

Qualifications of attendees. Must have basic understanding of electronics, audio principles, electrical engineering.

Zitel award a Course 1 training certificate to all successful candidates.

## About the trainer

John Blach started his career with Communication and Control, [CCE] Calverton, Nottingham, England in 1975 and rapidly rose to position of senior development engineer delivering designs initially destined for the coal mining market and then later for the embryonic UK North Sea petro chemical industry which included:-

150 Watt industrial power amplifier.

Current monitored loudspeaker circuit supervisory system.

Monitored Alarm tone generators.

PAGA management system.

Systems delivered during the 1970s through to early 1980s included BP [Forties off shore platform complex] DUC Danish Underground Consortium, ICI.

Following employment with Communication and Control was then involved in the design of PAGA equipment and systems for Elemec (1980s) Akusta, Spector Lumenex (1980s to 1990s), Vodec (2000s).

Presently John is Technical director with the design team at Zitel Ltd UK who are delivering 'state of the art' life safety critical PAGA to the petro chemical industry utilising CLASS G amplification, VOIP Communications media, addressable flashing beacons / loudspeakers and remote supervision via Internet.

Today literally thousands of PAGA Systems using John Blach's designs are in regular use on a worldwide basis in some of the most dangerous and hostile locations known to man.



**Cruden Bay Terminal Scotland, part of the BP Forties field pipe line installation.  
This was fitted with one of the first CCE PAGA systems designed by John Blach in the 1970s**



**BP Bruce platform North Sea 1993; this was fitted with a *quad* A, B, C, D PAGA system designed by John Blach.**



**Hibernia platform Canada this was fitted with one of the first computer supervised PAGA systems mid-1990s.**