

Access to your Inspection Records Online

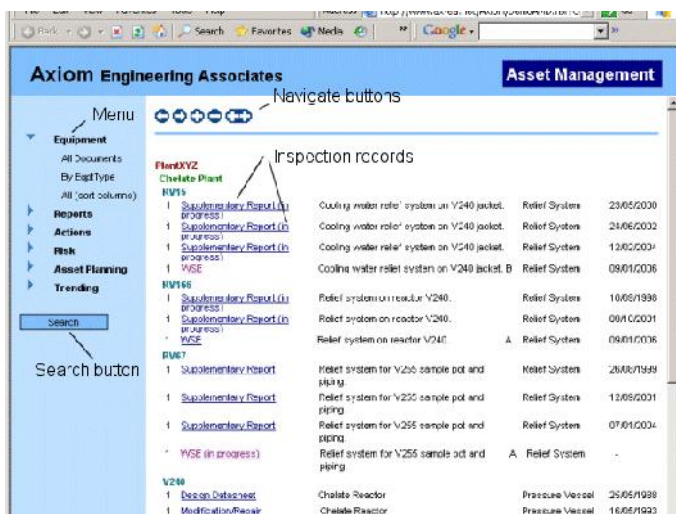
Every inspection that we carry out, every assessment, engineering design, calculation or failure analysis we do is recorded on our Asset Management Database for your equipment. When we have been asked to develop and Certify Written Schemes of Examination then these are also put into the database and form the central core of the system.

The advantages of having Internet access to your records are:

- Access to your records at any time, from any location as long as you have internet access.
- View your inspection records in different ways – e.g. group all your piping system records together or look at all your records per plant area.
- Rank your equipment in order of risk so you can focus your inspection efforts on high-risk items.
- Instantly access your records through a Google-like search engine.
- Access all your actions identified during the inspection and track them to completion.
- Group actions together to obtain budget estimates for asset life planning.
- Submit your own documents on-line as a repository for all activities to do with your specific equipment.
- Trend NDT measurements instantly.
- Link equipment together as associated items. Thus if it is known that one area is affected you can investigate to see which other equipment could be potentially affected.
- Receive online notifications to your email inbox when inspection reports have been completed or your endorsement is required for reports with hyperlinks to the records in question.

The database is secured by username and password access. Access is granted on a per-user basis so that access to individual databases is tightly controlled.

Typically the database looks like this:



Whenever we develop a Written Scheme of Examination (WSE), we identify each failure mode and thus what inspection is required in order to detect such potential deterioration. When we carry out an inspection in accordance with the written scheme, you can trace back each part of the inspection to the WSE.

Any parts not examined in accordance with the WSE are instantly known about and any unacceptable items are highlighted. Thus we avoid what is known as 'exception reporting' where only faults are highlighted in the report.

Written Scheme of Examination for : 100/003 Chrome Tan Sulphuric Acid Piping System rev: 1
Project: 0040074

Description

Client	ABC Chemicals Ltd (46)
Plant	PlantXYZ
Unit	Chrome Tan
Equipment ID	100/003
Equipment Name	Chrome Tan Sulphuric Acid Piping System
Equipment Type	Piping
Equipment Scope	See isometrics for extents of system
Functional Descriptn	Conveys Sulphuric Acid from storage tank 46/343 to a weigh off IBC inside the Chrome Tan plant

Shell

Safe Operating Limits:	The Safe Operating Limits are: 6 barg, Ambient
Max design pressure:	6 barg
Minimum design pressure:	1 barg
Max design temperature:	Ambient °C
Minimum design temperature:	Ambient °C
Volume	m³
Comments	Operates at ambient temperature

Construction Info.

Manufacturer:	Unknown
Serial No:	Not applicable
Design Code:	Unknown

An example of a Written Scheme of Examination

ABC Inspection Issos.pdf
Mean Risk score: 6 Max risk score: 6 Min Risk score: 6

Specific Areas for Examination

Int	LocID	Detl	Failure	Deterioration Mode	Rate	F	Fc	R	Inspection Type & Location	Meth	Thresh
Int	None	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Full thorough visual examination of the ...	VIS	All sign
Int	TP069	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP69		Any cha
Int	TP070	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP70		Any cha
Int	TP071	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP71		Any cha
Int	TP072	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP72		Any cha
Int	TP073	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP73		Any cha
Int	TP074	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP74		Any cha
Int	TP075	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP75		Any cha
Int	TP076	1	Loss of containm	Corrosion/erosion	Up to 1mm/ye	T	H	6	Ultrasonic thickness scan of UTS TP76		Any cha

Endorsements & Certification

Endorsements are only valid when a date appears after the name which indicates the person identified has signed the WSE. The appearance of Signed by XXXX after the name indicates that the WSE has been peer-reviewed on behalf of the endorser.

Owner (note):

Written Scheme of Examination – individual inspection

As can be seen in figure 4 below, inspected items that are unacceptable or have not been inspected 'float' to the top of the report and be dealt with first.

Inspection Report for: 100/003 Chrome Tan Sulphuric Acid Piping System
Client: ABC Chemicals Ltd (46) Project:0040074

Equipment

Plant:	PlantXYZ
Unit:	Chrome Tan
Equipment ID:	100/003
Equipment Name:	Chrome Tan Sulphuric Acid Piping System
Equipment Type:	Piping

Inspection

This inspection was carried out in accordance with Written Scheme 1 for this item.
The inspection was carried out on: **Thu 07 Oct 2004**.
Based upon the inspection carried out, the equipment was found to be **Acceptable - Remedial work required**.

The full inspection interval has been **Retained** at 50 months
The intermediate inspection interval has been **Retained** at 26 months

The next full inspection is due: **Sun 07 Dec 2008**
The next intermediate inspection is due: **Thu 07 Dec 2006**

Interim Report of Examination (IRE) form issued: **IRE Not Issued**.
Witness of Pressure Test (WPT) form issued: **WPT Not Issued - No pressure test carried out**.

LocID	DetID	Inspection Type & Location	Insp?	OK	(1)	(1b)	(2)	(2b)	(3)	(3b)	(4)
None	1	Full thorough visual examination of the piping system as defined on inspection isometrics 100/003/004, 100/003/005 and the piping inspection checklist.	Y	N							
TP079	1	Ultrasonic thickness scan of TP79	N	NA							
TP080	1	Ultrasonic thickness scan of TP80	N	NA							
TP082	1	Ultrasonic thickness scan of TP82	N	NA							

Inspection Report (additional comments)

Inspection

This is just a fraction of what our database can do. One feature of working with Axiom is that all our project documentation can also be made available to you online.