Cloud reigns over (SPIR) spread-sheets
Agenda

- Company introduction
- Market developments
  - Master Data Management - MDM
  - Cloud advantages
- SPIR process
  - Current situation and issues
  - Spearhead – a fully integrated solution:
    - MDM, Workflow, Visibility
- Q&A
Overview

for multi-site, asset intensive, companies

sparesfinder
materials data, mastered.
What we started doing

“Industrial Napster” enables perfect inventory management....

but...

- the data wasn’t good enough
- the market was barely ready
What we do now

sparesFinder focuses on:

- Any Master Data process that relates to spares and materials
  - Material masters
  - Bills of materials / tags
  - Maintenance / failure modes
  - Tracking (e.g. rentals / OCTG repair)

- Supporting services to deliver a business solution
  - Data cleaning projects
  - Technical dictionary
  - ERP integration

- ASP / SaaS / Cloud Applications
  - “What is the advantage of this being hosted / pooled from the business process perspective? (i.e. not just cost)”
Recent survey of Asset Managers

Technology Enablers – Part 1

- **Master Data Management**
  - Best-in-Class: 72%
  - Industry Average: 51%
  - Laggard: 31%

- **Analytics**
  - Best-in-Class: 65%
  - Industry Average: 46%
  - Laggard: 29%

- **Workflows**
  - Best-in-Class: 63%
  - Industry Average: 38%
  - Laggard: 43%

- **Dashboards**
  - Best-in-Class: 58%
  - Industry Average: 37%
  - Laggard: 39%

- **Change Management**
  - Best-in-Class: 48%
  - Industry Average: 30%
  - Laggard: 33%

Percentage of Respondents, n = 140
Why Materials Master Data?

🌿 Poor descriptions have been tolerated for much too long, but:

🌿 Industry focus on safety and quality – can you afford to be liable for fitting the wrong part?

🌿 ERP systems becoming increasingly consolidated but the value is significantly diminished if the foundation data poor

Performance on a poor foundation........
The clouds are gathering!

“Aberdeen Group
A Harta-Hanx Company

What appeals to you to consider cloud?

- Lower total cost of ownership: 56%
- Reduces the cost and effort of upgrades: 51%
- Seeking best fit solution - will consider any delivery model: 39%
- Lower upfront costs: 35%
- We have limited IT resources and no interest in building IT staff: 31%

All Respondents
Percentage of Respondents, n = 140

“First adopters will be in the asset management/maintenance space”
Cloud Advantages

- Single version of software
  - “No bugs”
  - Fast upgrade

- Shared IT infrastructure
  - Security, patches, back-ups, etc all taken care of = low hassle
  - BUT - exclusive databases / private cloud remain options

- Web based so accessible anywhere
  - Perfect for collaboration!

- Rental / Subscription commercial
  - No long lock in
  - Keeps vendors focussed
What are SPIRs?

- Spares Parts Interchangeability Records
- List the spares associated with each system / equipment
- Provide recommendations of the quantity of spares that should be purchased to support construction and operations
- Collect various other data about the spares
- Responsibility of project teams
## Sample SPIR Form

### Total Number of Equipped Parties

<table>
<thead>
<tr>
<th>Detailed Long Text Description</th>
<th>Cross-Section Drawing Number</th>
<th>Original Component Manufacturer Local Part Number</th>
<th>Original Equipment Manufacturer Part Number</th>
<th>Name of Manufacturer of Part Identified in Section 1</th>
<th>Material</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
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<td>12</td>
<td>12</td>
</tr>
</tbody>
</table>

### Quantity Recommended by Supplier

#### Capital
- Pre-Commissioning
- Commissioning & Start-Up
- Operational / Two Year

<table>
<thead>
<tr>
<th>14</th>
<th>15</th>
<th>16</th>
<th>17</th>
<th>18</th>
<th>19</th>
<th>20</th>
<th>21</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capital</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Pre-Commissioning</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Commissioning &amp;</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
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<tr>
<td>Start-Up</td>
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<tr>
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<td>1</td>
<td>1</td>
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<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
</tbody>
</table>

### Quantity Recommended by EPC Contractor

#### Capital
- Pre-Commissioning
- Commissioning & Start-Up
- Operational / Two Year

<table>
<thead>
<tr>
<th>34</th>
<th>35</th>
<th>36</th>
<th>37</th>
</tr>
</thead>
<tbody>
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<td>Capital</td>
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<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Pre-Commissioning</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Commissioning &amp;</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Start-Up</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Operational /</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Two Year</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
</tbody>
</table>

### Quantity Approved by Owner

#### Capital
- Pre-Commissioning
- Commissioning & Start-Up
- Operational / Two Year

<table>
<thead>
<tr>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capital</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Pre-Commissioning</td>
<td>2</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>Commissioning &amp;</td>
<td>4</td>
<td>4</td>
<td>4</td>
</tr>
<tr>
<td>Start-Up</td>
<td>2</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>Operational /</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Two Year</td>
<td>2</td>
<td>2</td>
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</tr>
</tbody>
</table>

### Notes

- [SPIR #1 - another page](link)
- Confidential

---

[Image: sparesfinder_materials_data_mastered.png]
### Example - SPIR #3

**RFQ Doc 006 - PROJECT: AKYEM - SPARE PARTS IDENTIFICATION**

<table>
<thead>
<tr>
<th>Part No.</th>
<th>Description</th>
<th>Quantity</th>
<th>Supplier</th>
<th>Price</th>
<th>Delivery Leadtime</th>
<th>Remaining Availability</th>
</tr>
</thead>
<tbody>
<tr>
<td>100001</td>
<td>Part A</td>
<td>100</td>
<td>Supplier X</td>
<td>$500.00</td>
<td>12 weeks</td>
<td>500 units</td>
</tr>
<tr>
<td>200001</td>
<td>Part B</td>
<td>50</td>
<td>Supplier Y</td>
<td>$600.00</td>
<td>18 weeks</td>
<td>200 units</td>
</tr>
</tbody>
</table>

**Original Equipment Purchase Order Number:** J12673208

**Spare Parts Purchasing Information**

<table>
<thead>
<tr>
<th>Supplier</th>
<th>Unit of Issue</th>
<th>Price per Unit</th>
<th>Price Valid Until</th>
<th>Leadtime in Days</th>
<th>Expected Usage Year 1</th>
<th>Expected Usage Year 2</th>
<th>Expected Usage Year 3</th>
<th>Expected Usage Year 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>TECO</td>
<td>Each</td>
<td>$566.00</td>
<td>Nov-10</td>
<td>30</td>
<td>0</td>
<td>1</td>
<td>0</td>
<td>1</td>
</tr>
</tbody>
</table>

**Manufacturer / Supplier Expected Usage (x 4 Yrs)**

<table>
<thead>
<tr>
<th>Year 1</th>
<th>Year 2</th>
<th>Year 3</th>
<th>Year 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>9</td>
<td>10</td>
<td>15</td>
<td>16</td>
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<td>17</td>
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<tr>
<td>10a</td>
<td>10b</td>
<td>12</td>
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<td>15</td>
</tr>
<tr>
<td>12</td>
<td>13</td>
<td>14</td>
<td>15</td>
</tr>
</tbody>
</table>

*Slide 14 Confidential*
Just some of the issues

- No control over descriptions, data needs to be re-cleaned
- No ability to look across entire project, just a series of unlinked spreadsheets
- Accurate reporting of progress – a pipe dream!
- No link to current inventory or master catalogue
- Cumbersome process to load to operational ERP
- No simple record of changes and sources
- No workflow – spreadsheets emailed around controlled by version numbers
- Spares recommendations – no clear trail back to criticality, FMEA, maintenance or supply chain factors
So we built Spearhead

- Current process is largely spread-sheet driven..... which are unsuited to any complex process and inherently:
  - Lack control and visibility
  - Increase process cost and risk

- Some early electronic versions, but none that are integrated to operational master data / master catalogue

- Natural extension for sparesFinder to add functionality around what creates the demand for spares, namely the asset
Spearhead provides asset owners, EPCs and equipment suppliers with a collaborative solution to capture, verify and deliver all of the spares data required to get new plant and equipment operational.
Some of the challenges

- Many participants
  - Asset owners
  - EPC
  - OEM / Suppliers
  - Cataloguers
- Often pre-ERP
- Project managers are naturally focussed on risk and timing rather than on operational costs
- SPIR spread-sheet processes well established in current projects
Specific features

- **Search**
  - Comprehensive search capability against existing catalogue
  - Multi user access including external vendors

- **Early data capture**
  - Either load spread-sheets
  - Direct entry to software = process visibility

- **Governance of data**
  - Compliance with descriptive standards
  - Workflow for key data (e.g. spares recommendations)

- **Reports / tracking**
  - Tracking for procurement / delivery of spares to project schedule
  - Report by cost for a project against budget

- **Output**
  - Generation of purchase demands to purchasing system
  - Automatic data load of catalogue and BOMs to ERP
Set up Equipment Hierarchy
Build MEL directly...

- Master Equipment List
- Expand until level 10
- Equipment Nodes
  - NEWMONT MINING
    - AFRICA
    - AUSTRALIA
    - 6980: BODDINGTON
      - EXTRACTION
      - TRANSPORTATION
        - I2: MILL CONVEYOR
        - 78-I2: TRUCK
      - ENGINE
  - NORTH AMERICA
    - NEV: NEVADA
    - SOUTH AMERICA

- Add Equipment
  - Equipment Type: SECTION
  - SECTION Name: MEDICAL FACILITY
  - SECTION Notes: This is where we treat any injuries
...or in bulk from Excel
Rapid Search of MEL

**Type:** EQUIPMENT  
**Reference:** JPCG003  
**Name:** PINIONSHAFT AND HOUSING ASSEMBLY  
**Noun Modifier:**

**Asset Information**

**Equipment Attributes**

**Authority Group**
- Purchasing
- Stock Coordinator
- APPROVED

**Contract Information**

Contractor: PETROFAC

**Criticality Type:** Major

Consequences of equipment failure:
- **SAFETY**
  - Minor: Minor injury, no lost time
- **ENVIRONMENT**
  - Major: External environmental damage or non-compliance
- **OPERATIONAL IMPACT**
  - Moderate: Working relationships degraded or need for significant management input
- **RELIABILITY & AVAILABILITY**
  - Major: 1 week to 1 month for critical plant
- **COST**
  - Major: Major plant damage > $1,000,000
- **SOCIAL IMPACT**
  - Minors: Reputation affected resulting in complaints

**No Item Assigned**
Link to existing items / add new

Item Selection

Manufacturer Filter
Quick Item Select

sF Master Number: 15017  Manufacturer Name: FISHER  Part Number: 10A0811X012
Description: O-RING:FLUOROELASTOMER,10A0811X012,FISH^  
sF Master Number: 60951  Manufacturer Name: FISHER  Part Number: 10A0042X052
Description: O-RING:1-1/16x1-1/4in/NITRILE:DS52-1

New Item Details

Manufacturer Name  FISHER
Manufacturer Part No  10A0042X052
Base UOM  EACH
Item Description  O-RING: 1-1/16 INCH ID, 1-1/4 INCH OD, 3/32 INCH WD, NITRILE-DS52-1

New Item Details

Manufacturer Name  FISHER
Manufacturer Part No  10A0042X052
Base UOM  EACH
Item Description  O-RING: 1-1/16 INCH ID, 1-1/4 INCH OD, 3/32 INCH WD, NITRILE-DS52-1

New Item Details

Noun Modifier
O-RING
INSIDE DIAMETER
CROSS-SECTIONAL SIZE
MATERIAL
MATERIAL GRADE
SHORE HARDNESS
STANDARD
REFERENCE STANDARD
CONSTRUCTION

Clear All  Proceed
Assess Equipment Criticality, link to Master Catalogue and BOM

Type: Equipment  Reference: 12  Name: MILL CONVEYOR  Noun Modifier: CONVEYOR

### Master Equipment List

- NEWPORT MINING
  - AFRICA
  - AUSTRALIA
  - 6900: BODDINGTON
    - EXTRACTION
    - TRANSPORTATION
      - MILL CONVEYOR
      - 79-12: TRUCK
        - ENGINE
        - 79-13: TRUCK
        - 79-14: TRUCK
        - 79-15: TRUCK
        - 79-16: TRUCK
        - 79-17: TRUCK
        - 79-18: TRUCK
        - 79-19: TRUCK
      - TRANSPORTATION
    - NORTH AMERICA
      - NEV: NEVADA
      - SOUTH AMERICA

### Equipment Information

- UnApproved
- Assigned to: David Stroud

- Criticality Type: BOSS INTERESTED

- Consequences of equipment failure:
  - SAFETY: MARGINAL
    - Minor Personnel injury, no public impact
  - PRODUCTION: BOSS INTERESTED
    - Impact equivalent to total production downtime of greater than

- Manufacturer: No Manufacturer
- P/N: 1440512
  - Noun Modifier: CONVEYOR ANY
  - TYPE: SECTION
  - SIZE: 600X300 MM
  - LENGTH: 1500 MM
  - CONSTRUCTION: COMPLETELY MOUNTED WITH ROLLER BRACKETS AND CHAIN

### Equipment Bills of Material

<table>
<thead>
<tr>
<th>Manufacturer</th>
<th>Part Number</th>
<th>Description</th>
<th>UOM</th>
<th>Quantity</th>
</tr>
</thead>
<tbody>
<tr>
<td>ASCO JOUCOMATIC</td>
<td>43701026</td>
<td>CYLINDER PNEUMATIC; TYPE: MAGNETIC DOUBLE ACTING; BO...</td>
<td>EA</td>
<td>1</td>
</tr>
<tr>
<td>LEGRAND</td>
<td>073156</td>
<td>RECEPTACLE ELECTRICAL; TYPE: 3-PLUG 6-MODULE AUTOMA...</td>
<td>EA</td>
<td>1</td>
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</tbody>
</table>
Configure Equipment Attributes

### Equipments > Equipment Attributes

<table>
<thead>
<tr>
<th>Data Level</th>
<th>Equipment Type</th>
<th>Authority Group</th>
</tr>
</thead>
<tbody>
<tr>
<td>Equipment</td>
<td>SPARE</td>
<td>EPC</td>
</tr>
<tr>
<td>Equipment</td>
<td>EQUIPMENT</td>
<td>Owner</td>
</tr>
<tr>
<td>Equipment</td>
<td>SPARE</td>
<td>Owner</td>
</tr>
</tbody>
</table>

#### Equipment Attributes

<table>
<thead>
<tr>
<th>ERP Attribute Name</th>
<th>UOM</th>
<th>Entry Type</th>
</tr>
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<tbody>
<tr>
<td>RECOMMENDED SPARES (BUILD)</td>
<td>UOM</td>
<td>Open Number (0-200)</td>
</tr>
<tr>
<td>RECOMMENDED SPARES (2-YEAR)</td>
<td>UOM</td>
<td>Open Number (0-200)</td>
</tr>
</tbody>
</table>

#### ERP Attribute Name

- **ERP Attribute Name**

#### ERP Attribute Value

- **ERP Attribute Value**

<table>
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<tr>
<th>Fixed Price</th>
<th>Code</th>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>TIME &amp; MATERIALS</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>
Each SPIR has the correct data structure.

### Contract Information

<table>
<thead>
<tr>
<th>Select</th>
<th>Contract Type</th>
<th>Contract Number</th>
<th>Contractor</th>
<th>Description</th>
<th>Start Date</th>
<th>Finish Date</th>
<th>Responsible Engineer</th>
<th>Contract Supervisor</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>SPIR</td>
<td>AB-1234</td>
<td>PETROPEC</td>
<td>Contract to provide SPIR for Gas Detectors</td>
<td>3/03/2012</td>
<td>3/05/2012</td>
<td>Bruce Bell</td>
<td>Davey Alvarez</td>
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</tbody>
</table>

### Authority Group

- Finance

### Contract Documents

<table>
<thead>
<tr>
<th>Select</th>
<th>Type</th>
<th>View</th>
<th>Description</th>
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<td></td>
<td>Contract Information</td>
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</table>

### Contract Tasks

<table>
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<tr>
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<th>Task Name</th>
<th>Description</th>
<th>Authority Group</th>
<th>Number of Days</th>
<th>Completion Status</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>SPIR RECEIVED</td>
<td>Receipt of SPIR by Contractor</td>
<td>Supplier</td>
<td>5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>SPC REVIEWS SPIR</td>
<td>Review of recommendations</td>
<td>EPC</td>
<td>6</td>
<td>✓</td>
</tr>
<tr>
<td></td>
<td>ACCEPT SPARES REPORT</td>
<td>Acceptance of spares recommendations</td>
<td>Owner</td>
<td>3</td>
<td>✓</td>
</tr>
<tr>
<td></td>
<td>3K CO-ORDINATOR</td>
<td>TADM</td>
<td></td>
<td>4</td>
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</tr>
</tbody>
</table>

### Asset Reference

<table>
<thead>
<tr>
<th>Asset Reference</th>
<th>Asset Name</th>
<th>Assigned to</th>
<th>Approval Status</th>
<th>Manufacturer</th>
<th>Part Number</th>
<th>Description</th>
<th>Purchasing Contract Number</th>
<th>SPIR Contract Number</th>
</tr>
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<tbody>
<tr>
<td>14-AT13028</td>
<td>50-PT-14672</td>
<td>Not Assigned</td>
<td>Unapproved</td>
<td>INGERSOLL RAND</td>
<td>7199-0718</td>
<td>SEAL ASSY 40mmX1050mm</td>
<td>AB-1234</td>
<td>AB-1234</td>
</tr>
<tr>
<td>14-AT13029</td>
<td>AA GAS DETECT - CO CATALYST HSG</td>
<td>Not Assigned</td>
<td>Unapproved</td>
<td>David Stroud</td>
<td></td>
<td></td>
<td>AB-1234</td>
<td>AB-1234</td>
</tr>
<tr>
<td>14-10-IA101</td>
<td>FREE STANDING OUTDOOR UNIT-MOSQUE</td>
<td>Not Assigned</td>
<td>Unapproved</td>
<td>ADM</td>
<td>1254-55555</td>
<td>PUMP CENTRIFUGAL</td>
<td>AB-1234</td>
<td>AB-1234</td>
</tr>
<tr>
<td>14-AT10001</td>
<td>Methyl Acetate</td>
<td>Not Assigned</td>
<td>Unapproved</td>
<td>ALSTOM</td>
<td>5328PH</td>
<td>MOLDER FUSE/ULTRASAFE/42120V/12A/0IN-LINE</td>
<td>AB-1234</td>
<td>AB-1234</td>
</tr>
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Add recommended spares per item..
.. or in bulk

<table>
<thead>
<tr>
<th>Contract Type</th>
<th>Contractor</th>
<th>Contract Number</th>
<th>Description</th>
<th>MEL</th>
<th>Bills of Materials</th>
<th>Spare</th>
<th>Start Date</th>
<th>Finish Date</th>
<th>Responsible Engineer</th>
<th>Contract Supervisor</th>
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<td>SPIR</td>
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<td>Contract to provide SPIR for Gas Detectors</td>
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<td>Savvy Alvarez</td>
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<td>Matt Ludbrook</td>
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<td>David Stroud</td>
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<td>David Stroud</td>
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<td>Alessio Ferrini</td>
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<td>Ben Cousins</td>
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<th>Man Name</th>
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<th>Calc. Short Desc.</th>
<th>Total Fitted</th>
<th>Supplier-CAPITAL (1)</th>
<th>EPC-CAPITAL</th>
<th>Owner-CAPITAL (5)</th>
<th>Supplier-PRE-COMMISSIONING</th>
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<tbody>
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<td>3B5E031150R1</td>
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<td>VALVE</td>
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</tr>
</tbody>
</table>
Set up contract workflow to manage risk
Spares resource planning for maintenance

Maintenance Resource Planning

- Planned Maintenance
  - Operating Time
  - ON CONDITION
  - OIL SAMPLE FAILURE
  - CALENDAR
  - ANNUAL SERVICE

Unplanned Maintenance (100%)
- 100% BEARING FAILURE
- REPAIR AT EQUIPMENT

Resources for Annual Service

Maintenance Bills of Material

<table>
<thead>
<tr>
<th>Manufacturer</th>
<th>Part Number</th>
<th>Description</th>
<th>UOM</th>
<th>Quantity</th>
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<tbody>
<tr>
<td>PEERLESS</td>
<td>2610107-291</td>
<td>SCREW, CAP-HEAD: HEX-THREAD SIZE: 3/4in-THREADS: 1...</td>
<td>ST</td>
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<td>CLIF MKC</td>
<td>20004056</td>
<td>HOSE, ASSEMBLY: LENGTH: 48in, CONSTRUCTION SIZE: 1/4in...</td>
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<td>INGERSOLL</td>
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<td>REARING, NEEDLE - TYPE: BEVEL PINION - BORE TYPE: STRA...</td>
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</table>

Maintenance Documents

- Document: Inspection Guidelines

Manpower

- Type: Please Select
- Time Required: Please Select
- Task Description: 

<table>
<thead>
<tr>
<th>Type</th>
<th>Task Description</th>
<th>Time Required</th>
<th>UOM</th>
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</thead>
<tbody>
<tr>
<td>Electrical Technician</td>
<td>Inspect all connections for wet</td>
<td>2</td>
<td>Hour(s)</td>
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<tr>
<td>Electrical Technician</td>
<td>Earth Testing</td>
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<td>Hour(s)</td>
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<td>Electrical Technician</td>
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<td>1</td>
<td>Hour(s)</td>
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<tr>
<td>Electrical Technician</td>
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</tbody>
</table>
An fully integrated process

Web accessible, fully integrated software suite, delivering real time visibility of progress, KPI reporting and risk management

Cleaning of OEM provided descriptions to required standard
Cataloguing
Standardisation
De-duplication

Management of ERP Data required to create material master record
Commercial Items
Initial Order Quantity
Commercial Quantity

Procurement
Supplier Information
Demand aggregation

Automated Data Feed
Master Catalogue

Technical Dictionary,
Catalogue, Tag List,
SAP & Maximo
Configurations

Equipment Reference Data

ERP Reference Data

Spares Purchase Requirement

Spares requirements per equipment

Project managed in ERP?

Yes

Material Master / Purchasing

SAP

Temporary PO system / Stock Control System

Automated Data Feed

Tags and Maintenance

Document Control
Hyperlinked to tags (significantly reduced document count)

Equipment Purchase Requirements

Management of Materials Data related to specific Equipment Tag
Engineering Review
Specification
Quality
Criticality

Warehouse Data
Stock Location
Preservation

Reliability & Maintainability
Initial Order Quantity
Stock Levels

Stock Models
RAM, ACT, CSEA

Maintenance Plan Build

TAG Database
Tag List

OEM 1 SPIR Data

OEM 2 SPIR Data

OEM 3 SPIR Data

Direct Entry of SPIR Data
Key value to customers

- Visibility & Control over complex processes, leading to...
- Risk reduction and...
- Higher quality data, enabling...

People to make sound, intelligence based decisions!

Why sparesFinder?

- Fast – immediately available hosted software, to deliver business value and relieve pressure on the IT department
- Focussed – 14 years of managing spares data projects and a mature, proven reference dictionary
Control the process..
.. and get the performance!