SOFT MANAGEMENT: THE DILBERT APPROACH TO ADMIN

Steven Beames

Electronics Workshop, Office of Technical Services, Griffith University, Brisbane, QLD

(s.beames@griffith.edu.au)

Abstract:
A common problem these days is having to cope with increasing amounts of administrivia that, while essential, markedly decreases the time available to attend to our core technical specialities.

As a technician, my approach to this has been the on-going development of a single software package that consolidates as many of these tasks as possible, applies our business rules, and produces the required reports and feedback at the click of a button.

Originally developed for, and currently used by over a dozen staff in our Electronics and Mechanical Workshops, it can also be used by Laboratory and Clerical staff involved in ordering, task management, record keeping and analysis.

Current functions include:
- Timesheets
- Job assignment, scheduling, & charging
- Parts/materials ordering (for jobs & for clients) & cost recovery
- Equipment repair/service histories
- Client & Supplier databases
- Reporting

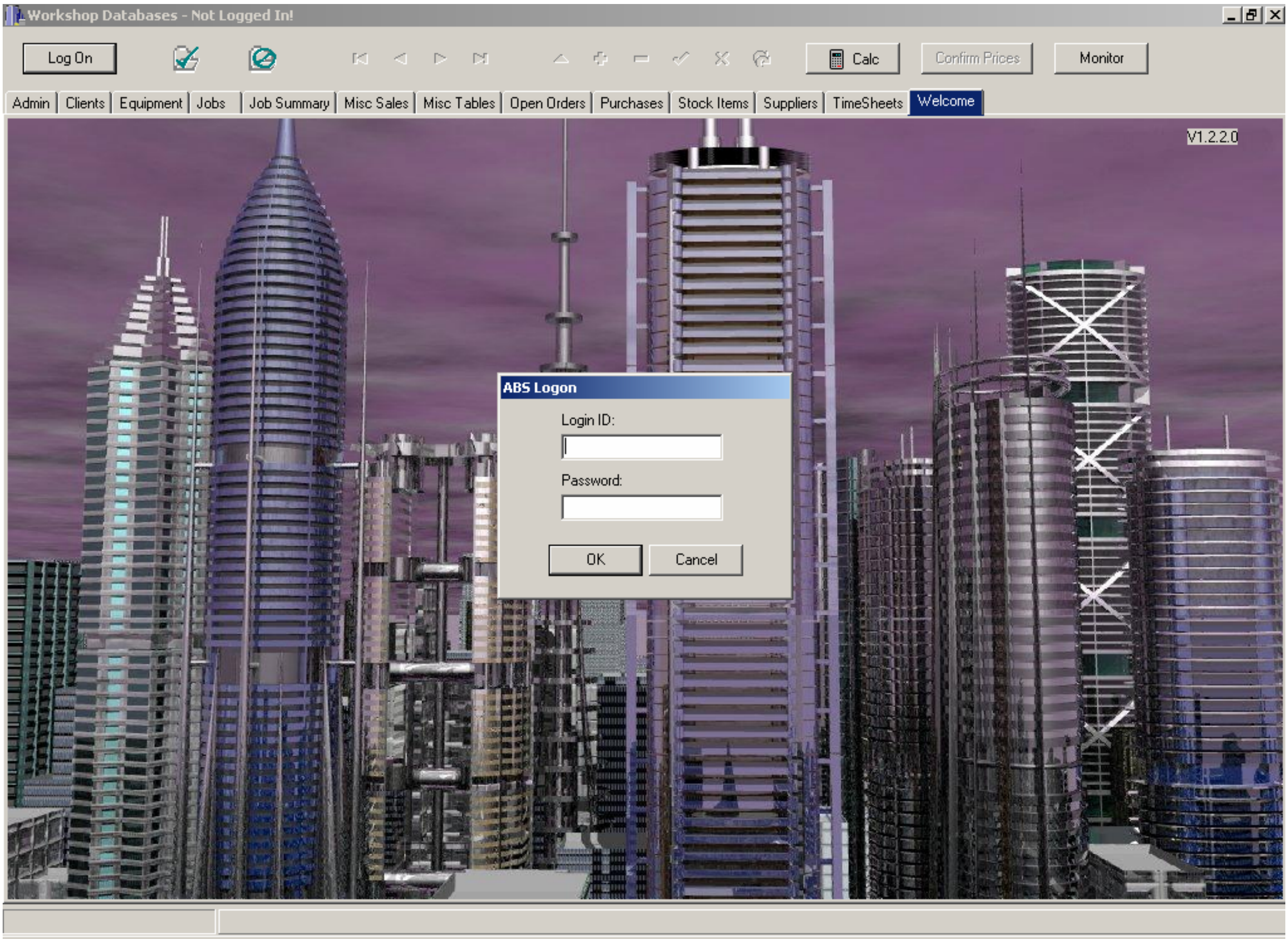
Planned developments are:
- Workload management (graphs of workload & backlog per HEW level over time)
- Workload analysis (visual feedback to staff on where their time is spent)
- Integration of several other databases (projects, magazine articles, second-hand parts, etc) into a common search page
- User designed reports

Introduction:
For this paper, I will describe some of the main features of each screen of the program as seen by the section manager. Bear in mind that most users see a bit less detail, so-as not to overwhelm them with unnecessary information. Since most operations are started from pop-up menus, I'll paste some of these menus over the following screenshots. The resulting dialogs are not included (I think I might already have just sneaked over the 4-page limit ;-)).

This program has been named 'ABS', in honour of a another well-known piece of finance software used by our university, amongst others, that was introduced to us as NABS. Before long, this was understood to stand for 'Not A Better System'. This program attempts to improve on that.

Our main requirement was that is should run on a network of standard Windows 2000/XP clients, and cost next to nothing. Our first server was a spare Celeron 566MHz no-name PC of unimpressive specifications, which performed quite well in this role.

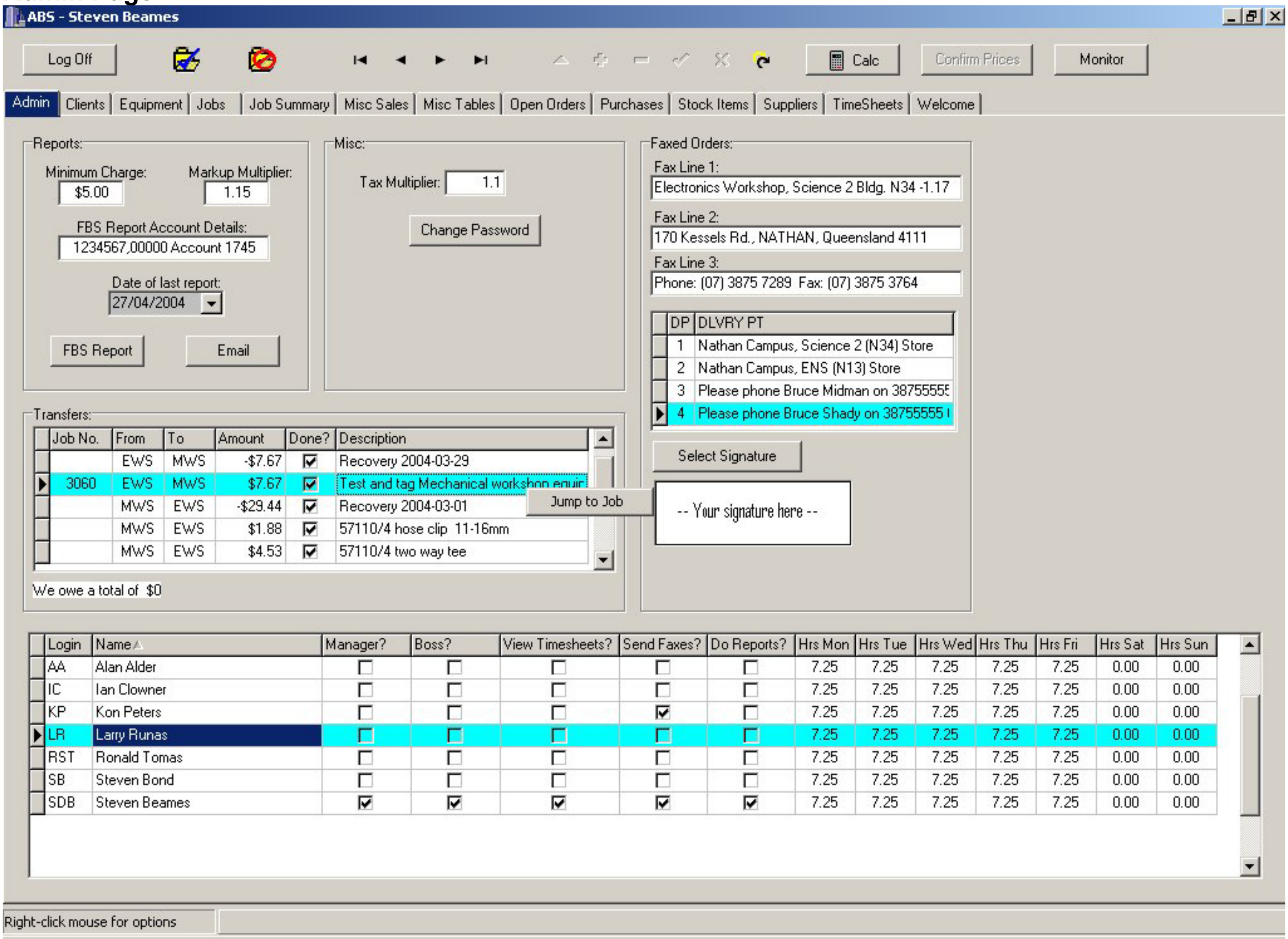
Program Description:
Welcome Screen –



Since this is a network-based client-server database, each user has a login and password that resolves which section they work for and their access privileges. After login, ABS will automatically check for, and download a new version of itself if an update is available.

At the top are various controls that are common to all pages. The two buttons next to the 'Log On' button allow making a number of changes permanent all at once, as a group, or rolling them all back to where you started. This is useful for undoing mistakes.

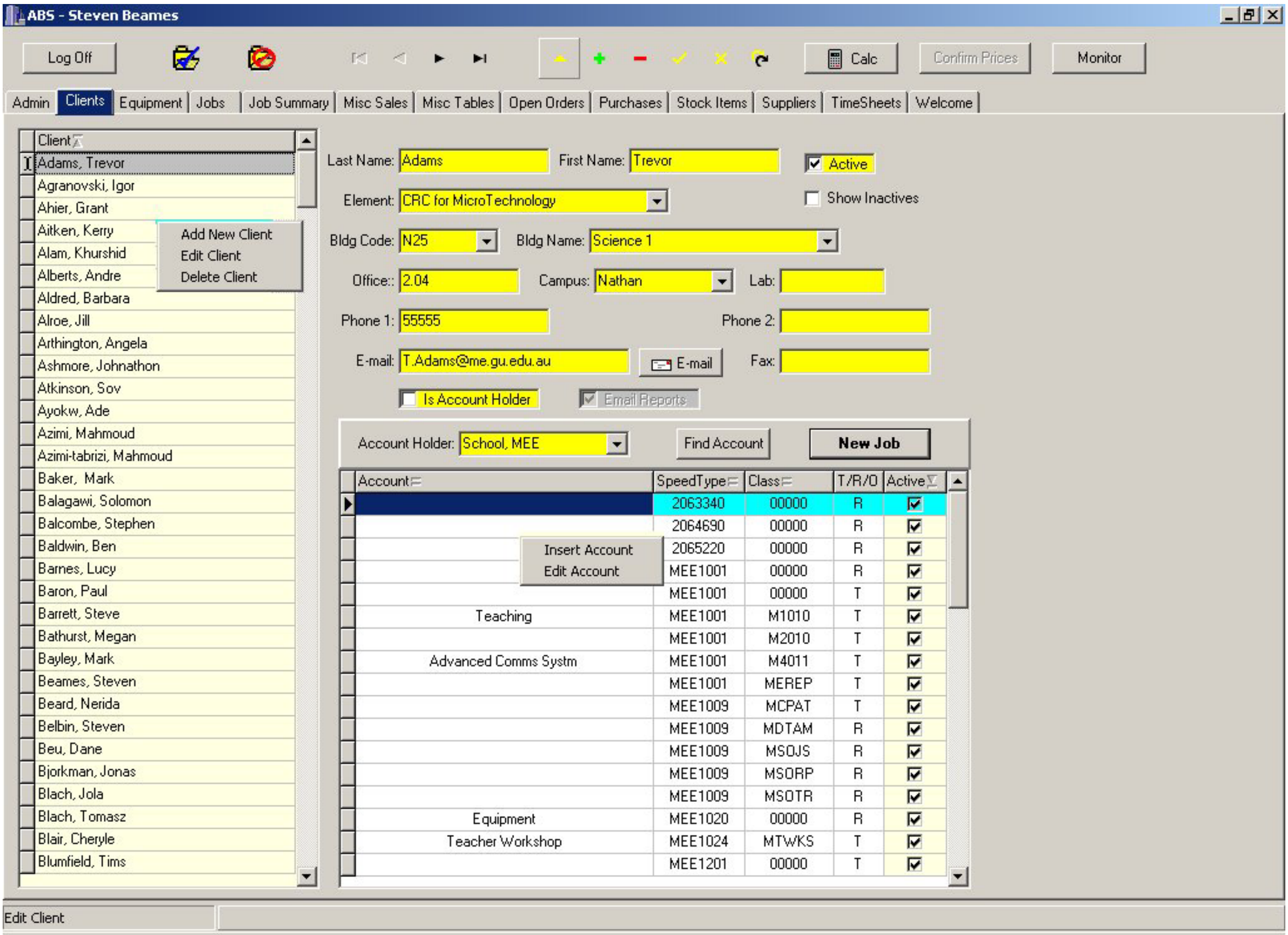
Admin Page –



The Admin form is a multipurpose page allowing the following details to be administered by the section manager. Starting from the top-left…

1. Minimum charge for jobs, mark-up on materials & items used on jobs or bought in for clients, & the destination account details for recovered funds (appears on report to Finance section, 'FBS'). The 'FBS Report' button produces a report that lists one line for each account code's total funds to be recovered back into our account. This includes completed jobs that haven't been reported yet, and miscellaneous sales of parts. The 'Email' button will generate an editable email (sent direct from ABS) for each account holder, listing each job and the amount and account being charged, so they will know why and how much their accounts are being debited for each job.
2. The Tax Multiplier is only used to display the GST inclusive price on the open orders we fax out. Internal charging is all ex-GST.
3. The Faxed Orders section allows editing of the details appearing on the faxes sent to the suppliers with whom we have open orders.
4. The Transfers section records details of transfers of funds between workshops and other OTS sections. Only the resulting balances are reported for recovery, to minimise accounting. The mark-up charged to other OTS sections is determined by a complex matrix of possibilities that hardwires our business rules, eg if the other workshop orders parts on our account for use on their job for a client, then we split the mark-up between workshops.
5. The bottom section allows managers to add, edit and remove staff from their section, and edit their access privileges, eg to allow someone else to send faxed open orders in the managers absence. The Hrs per day numbers are used for flexitime calculation on the Timesheet form.

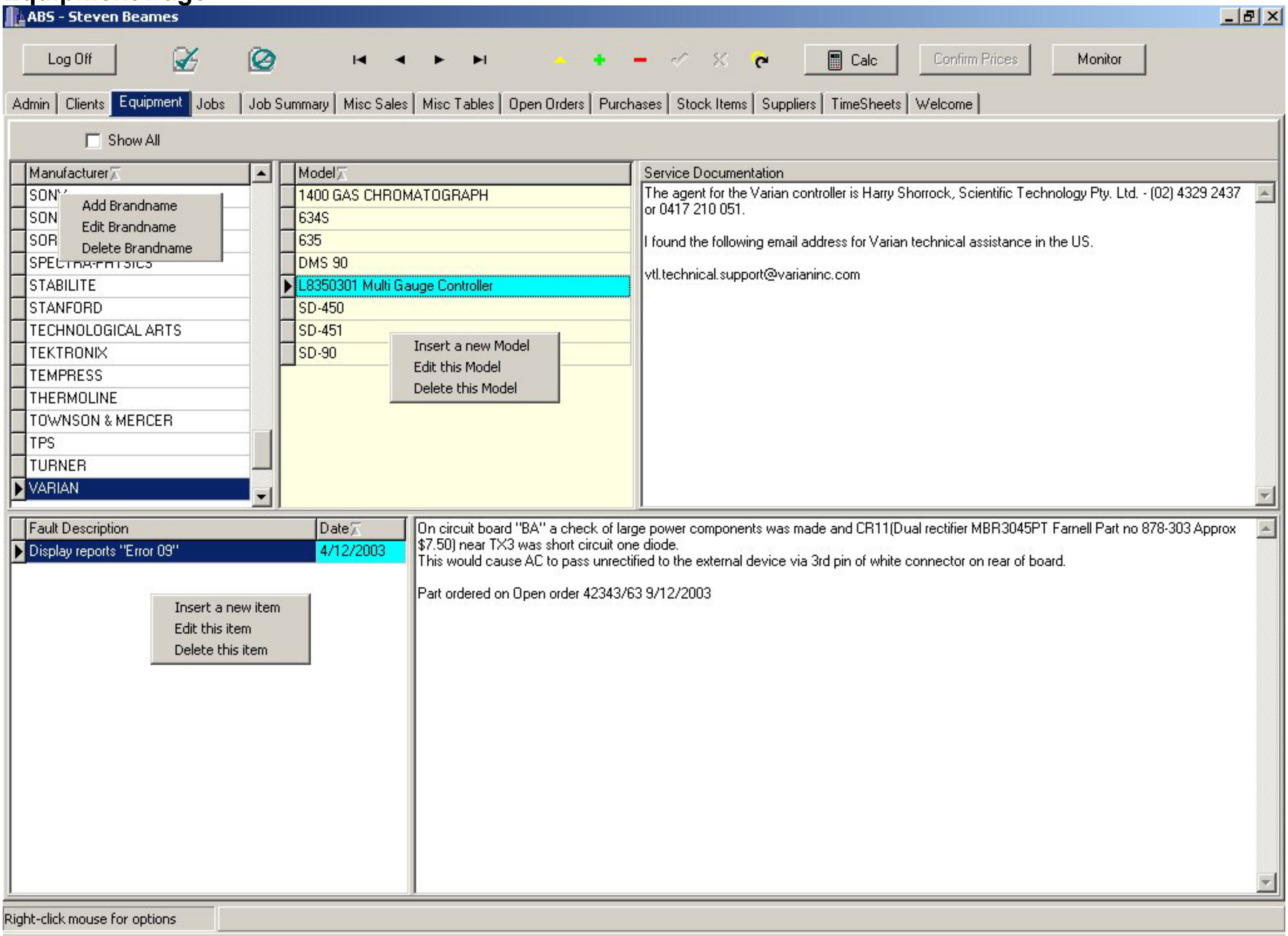
Clients Form –



This form obviously records client's details, so they only have to be entered once when they first request a job, & henceforth are available to all other users for future reference. Staff can be designated as Account Holders, in which case, their name will appear in the 'Account Holder' drop down box. Non-account holders can have one of these account holders selected as the default accounts that person will use when making requests. Old inactive accounts can be hidden from view. Accounts are marked as Teaching, Research, or Other, for reporting purposes. Accounts are checked when entered to prevent unnecessary duplication.

The Yellow colour indicates that the record is currently being edited. Red is used when deleting, and Green when inserting.

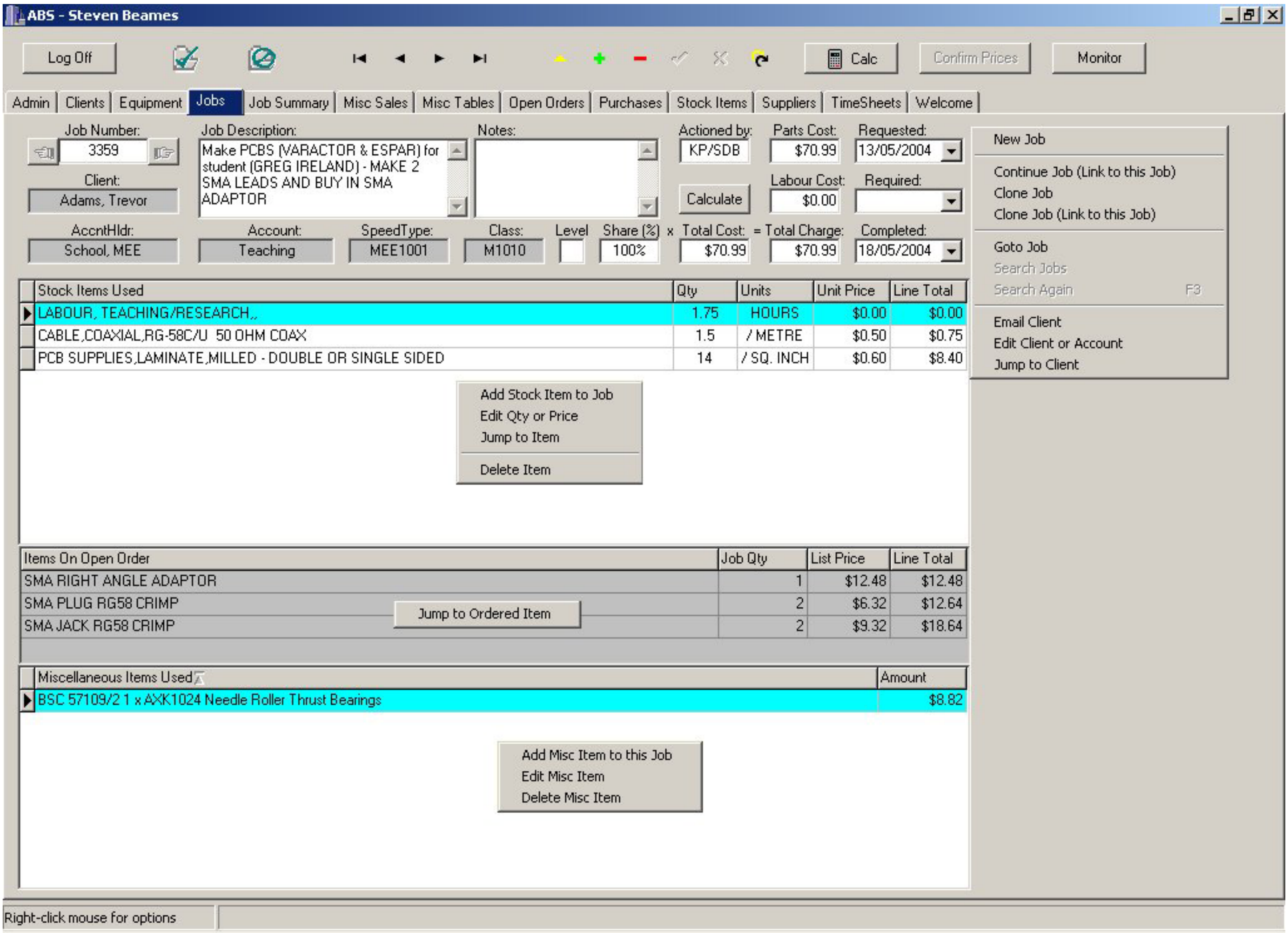
Equipment Page –



This section is used to keep a history file of past repair details, documentation availability, etc. for the equipment we look after. The 'Show All' button will reveal equipment details entered by other workshops or sections. Users are prompted to update information when repair jobs are finished.

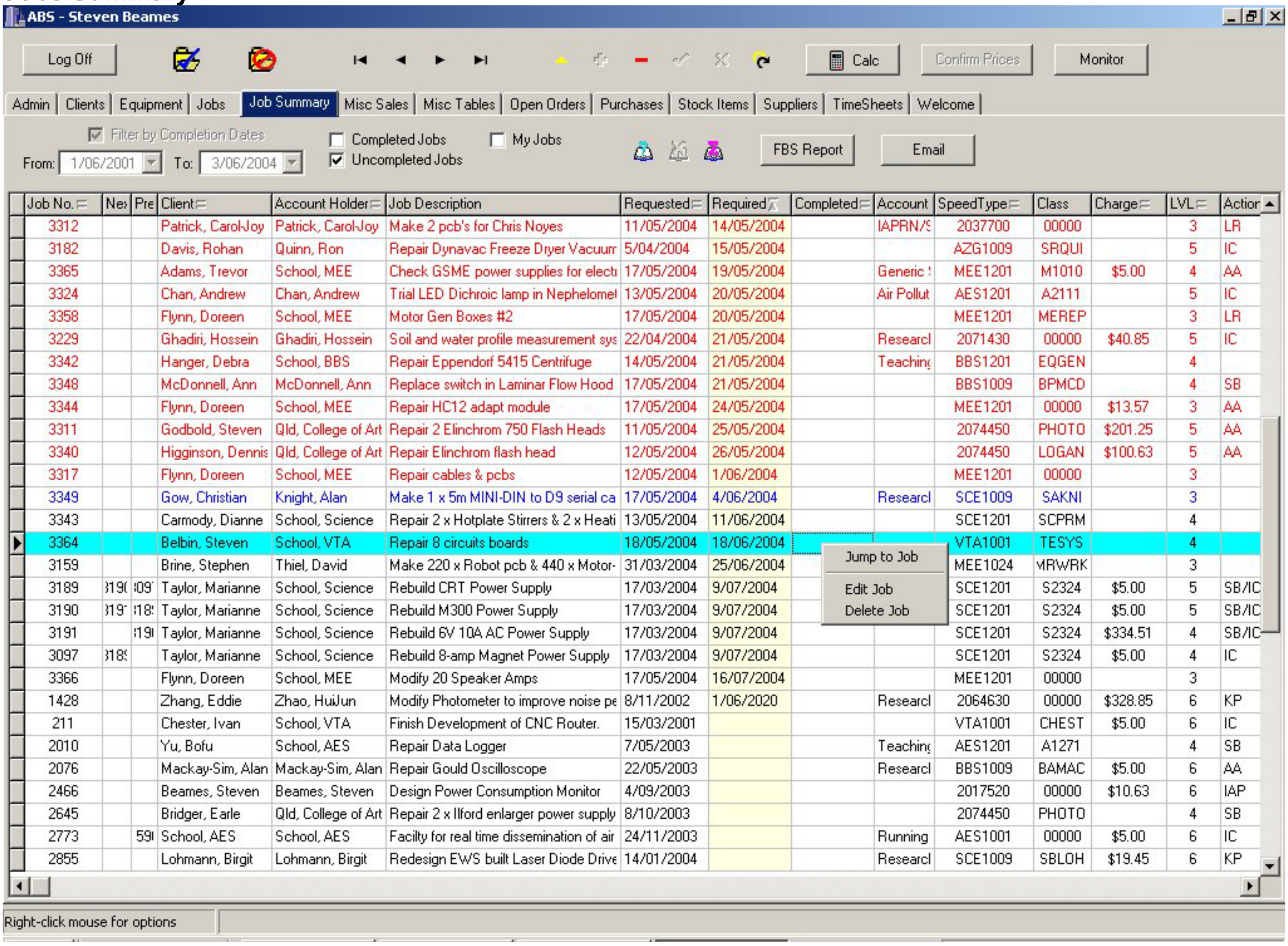
This section will be expanded in the future to include other categories, such as Datasheets, Technical Magazine Articles, Project Documentation, Salvaged Spares Locations, & Supplier Catalogues.

Jobs –



The details of new jobs are entered here and a new job number is automatically allocated. The manager determines the HEW level of the job, and may assign it to a particular worker. As the job proceeds, the worker might add items to our open orders using this job number, and these items will appear in the 'Items On Open Order' section, until they arrive and have been finalised by the manager, after which they'll move to either the 'Stock Items Used' section, or the 'Miscellaneous Items Used' section, at the managers choosing. The Total Charge for the job will automatically include our mark-up amount, but can be overridden if a firm price has been quoted.
Parts used from stock are added to the job, and miscellaneous parts ordered in are recorded automatically at the bottom, including supplier, order number, quantity, part number, description and cost.
Where the cost for a job is to be shared over several accounts, the job and all its details can be 'cloned', and an appropriate percentage can be entered for each job. These jobs are then linked by the buttons either side of the job number for quick navigation.
Jobs can be 'Continued' if required, which closes the current job by filling in the 'Completed' date, and creates a new job linked to this one with all the relevant details filled in. Thus money spent so far can be recovered whilst allowing the work to continue on towards completion.

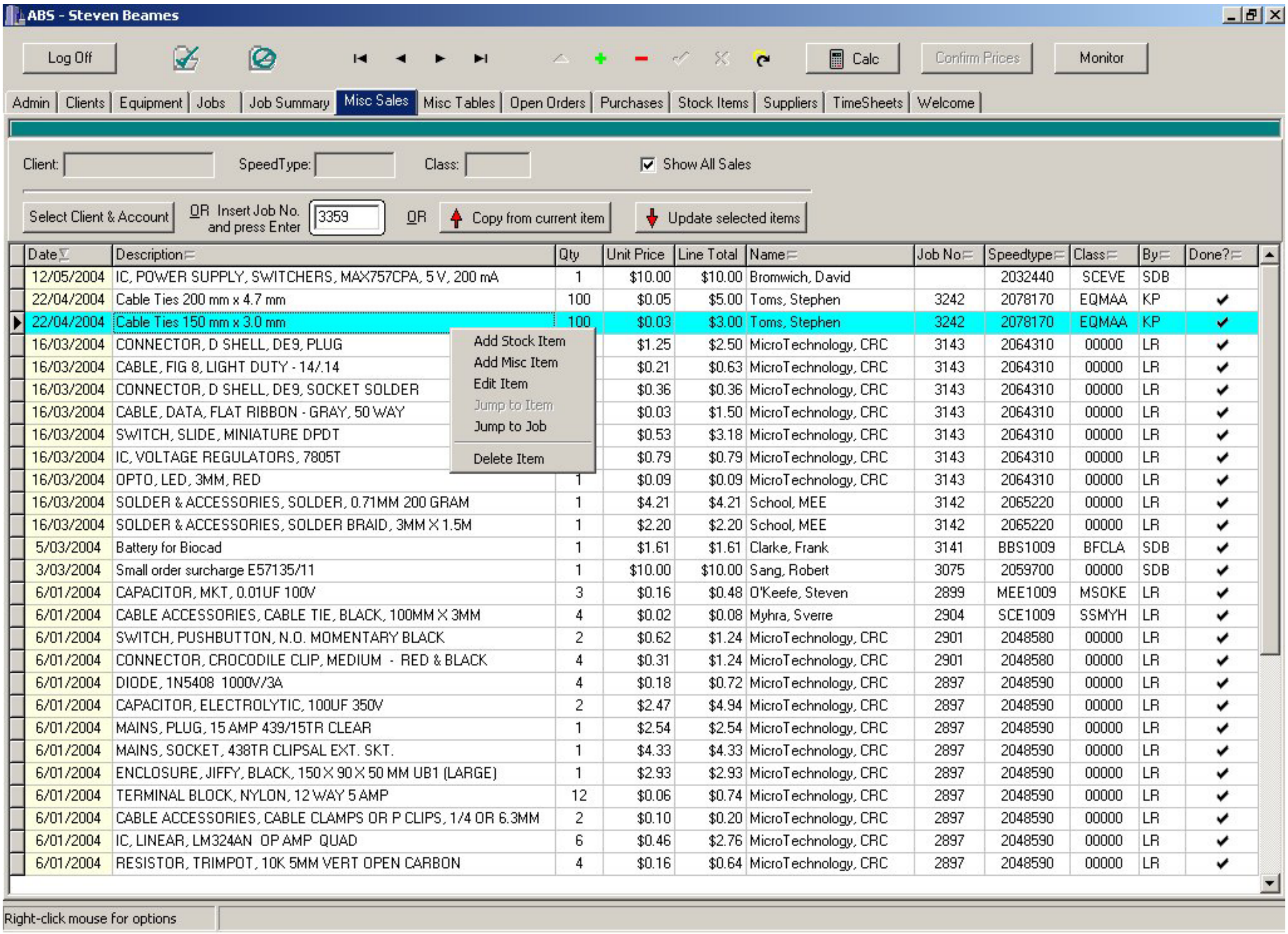
Jobs Summary –



Job No.	Ne:	Pre	Client	Account Holder	Job Description	Requested	Required	Completed	Account	SpeedType	Class	Charge	LVL	Actior
3312			Patrick, Carol-Joy	Patrick, Carol-Joy	Make 2 pcb's for Chris Noyes	11/05/2004	14/05/2004		IAPRN/S	2037700	00000		3	LR
3182			Davis, Rohan	Quinn, Ron	Repair Dynavac Freeze Dryer Vacuum	5/04/2004	15/05/2004			AZG1009	SRQUI		5	IC
3365			Adams, Trevor	School, MEE	Check GSME power supplies for electi	17/05/2004	19/05/2004		Generic !	MEE1201	M1010	$5.00	4	AA
3324			Chan, Andrew	Chan, Andrew	Trial LED Dichroic lamp in Nephelomel	13/05/2004	20/05/2004		Air Pollut	AES1201	A2111		5	IC
3358			Flynn, Doreen	School, MEE	Motor Gen Boxes #2	17/05/2004	20/05/2004			MEE1201	MEREP		3	LR
3229			Ghadiri, Hossein	Ghadiri, Hossein	Soil and water profile measurement sys	22/04/2004	21/05/2004		Researcl	2071430	00000	$40.85	5	IC
3342			Hanger, Debra	School, BBS	Repair Eppendorf 5415 Centrifuge	14/05/2004	21/05/2004		Teachin	BBS1201	EQGEN		4	
3348			McDonnell, Ann	McDonnell, Ann	Replace switch in Laminar Flow Hood	17/05/2004	21/05/2004			BBS1009	BPMCD		4	SB
3344			Flynn, Doreen	School, MEE	Repair HC12 adapt module	17/05/2004	24/05/2004			MEE1201	00000	$13.57	3	AA
3311			Godbold, Steven	Qld, College of Art	Repair 2 Elinchrom 750 Flash Heads	11/05/2004	25/05/2004			2074450	PHOTO	$201.25	5	AA
3340			Higginson, Dennis	Qld, College of Art	Repair Elinchrom flash head	12/05/2004	26/05/2004			2074450	LOGAN	$100.63	5	AA
3317			Flynn, Doreen	School, MEE	Repair cables & pcbs	12/05/2004	1/06/2004			MEE1201	00000		3	
3349			Gow, Christian	Knight, Alan	Make 1 x 5m MINI-DIN to D9 serial ca	17/05/2004	4/06/2004		Researcl	SCE1009	SAKNI		3	
3343			Carmody, Dianne	School, Science	Repair 2 x Hotplate Stirrers & 2 x Heati	13/05/2004	11/06/2004			SCE1201	SCPRM		4	
3364			Belbin, Steven	School, VTA	Repair 8 circuits boards	18/05/2004	18/06/2004			VTA1001	TESYS		4	
3159			Brine, Stephen	Thiel, David	Make 220 x Robot pcb & 440 x Motor-	31/03/2004	25/06/2004			MEE1024	MRWRK		3	
3189	319(	309	Taylor, Marianne	School, Science	Rebuild CRT Power Supply	17/03/2004	9/07/2004			SCE1201	S2324	$5.00	5	SB/IC
3190	319	318	Taylor, Marianne	School, Science	Rebuild M300 Power Supply	17/03/2004	9/07/2004			SCE1201	S2324	$5.00	5	SB/IC
3191		319	Taylor, Marianne	School, Science	Rebuild 6V 10A AC Power Supply	17/03/2004	9/07/2004			SCE1201	S2324	$334.51	4	SB/IC
3097	318		Taylor, Marianne	School, Science	Rebuild 8-amp Magnet Power Supply	17/03/2004	9/07/2004			SCE1201	S2324	$5.00	4	IC
3366			Flynn, Doreen	School, MEE	Modify 20 Speaker Amps	17/05/2004	16/07/2004			MEE1201	00000		3	
1428			Zhang, Eddie	Zhao, HuiJun	Modify Photometer to improve noise pe	8/11/2002	1/06/2020		Researcl	2064630	00000	$328.85	6	KP
211			Chester, Ivan	School, VTA	Finish Development of CNC Router.	15/03/2001				VTA1001	CHEST	$5.00	6	IC
2010			Yu, Bofu	School, AES	Repair Data Logger	7/05/2003			Teachin	AES1201	A1271		4	SB
2076			Mackay-Sim, Alan	Mackay-Sim, Alan	Repair Gould Oscilloscope	22/05/2003			Researcl	BBS1009	BAMAC	$5.00	6	AA
2466			Beames, Steven	Beames, Steven	Design Power Consumption Monitor	4/09/2003				2017520	00000	$10.63	6	IAP
2645			Bridger, Earle	Qld, College of Art	Repair 2 x Ilford enlarger power supply	8/10/2003				2074450	PHOTO		4	SB
2773		59	School, AES	School, AES	Facilty for real time dissemination of air	24/11/2003			Running	AES1001	00000	$5.00	6	IC
2855			Lohmann, Birgit	Lohmann, Birgit	Redesign EWS built Laser Diode Drive	14/01/2004			Researcl	SCE1009	SBLOH	$19.45	6	KP

Workers can view this page to determine which jobs should be tackled next. By default, 'My Jobs' is checked so you only jobs see your jobs, plus those not assigned to anyone in particular. They are initially sorted by Date Required, with overdue jobs in red, and jobs due in less than a week in blue. As you can see, I need more staff!

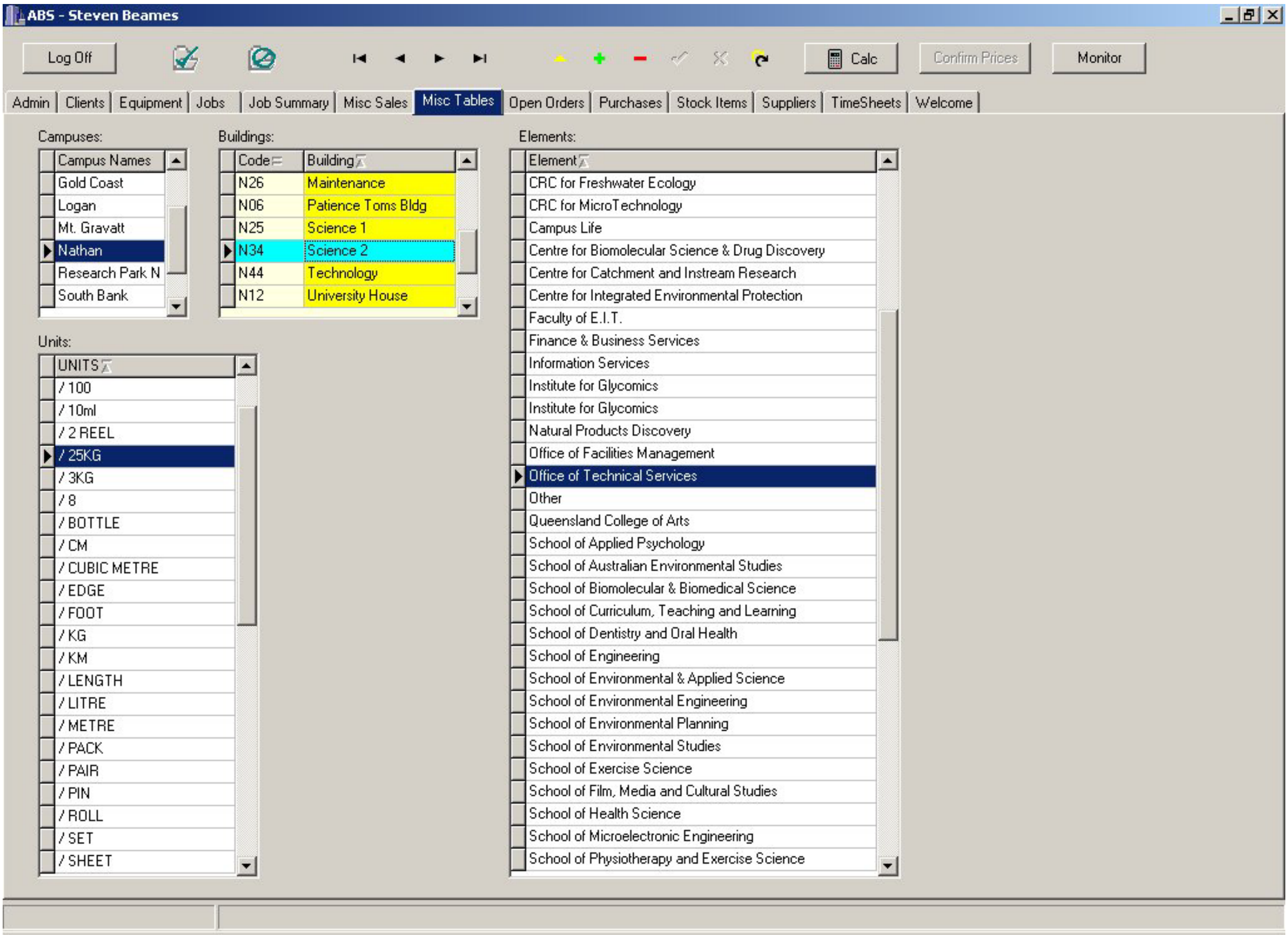
Misc Sales –



Date	Description	Qty	Unit Price	Line Total	Name	Job No	Speedtype	Class	By	Done?
12/05/2004	IC, POWER SUPPLY, SWITCHERS, MAX757CPA, 5 V, 200 mA	1	$10.00	$10.00	Bromwich, David		2032440	SCEVE	SDB	
22/04/2004	Cable Ties 200 mm x 4.7 mm	100	$0.05	$5.00	Toms, Stephen	3242	2078170	EQMAA	KP	✔
22/04/2004	Cable Ties 150 mm x 3.0 mm	100	$0.03	$3.00	Toms, Stephen	3242	2078170	EQMAA	KP	✔
16/03/2004	CONNECTOR, D SHELL, DE9, PLUG		$1.25	$2.50	MicroTechnology, CRC	3143	2064310	00000	LR	✔
16/03/2004	CABLE, FIG 8, LIGHT DUTY - 14/.14		$0.21	$0.63	MicroTechnology, CRC	3143	2064310	00000	LR	✔
16/03/2004	CONNECTOR, D SHELL, DE9, SOCKET SOLDER		$0.36	$0.36	MicroTechnology, CRC	3143	2064310	00000	LR	✔
16/03/2004	CABLE, DATA, FLAT RIBBON - GRAY, 50 WAY		$0.03	$1.50	MicroTechnology, CRC	3143	2064310	00000	LR	✔
16/03/2004	SWITCH, SLIDE, MINIATURE DPDT		$0.53	$3.18	MicroTechnology, CRC	3143	2064310	00000	LR	✔
16/03/2004	IC, VOLTAGE REGULATORS, 7805T		$0.79	$0.79	MicroTechnology, CRC	3143	2064310	00000	LR	✔
16/03/2004	OPTO, LED, 3MM, RED	1	$0.09	$0.09	MicroTechnology, CRC	3143	2064310	00000	LR	✔
16/03/2004	SOLDER & ACCESSORIES, SOLDER, 0.71MM 200 GRAM	1	$4.21	$4.21	School, MEE	3142	2065220	00000	LR	✔
16/03/2004	SOLDER & ACCESSORIES, SOLDER BRAID, 3MM X 1.5M	1	$2.20	$2.20	School, MEE	3142	2065220	00000	LR	✔
5/03/2004	Battery for Biocad	1	$1.61	$1.61	Clarke, Frank	3141	BBS1009	BFCLA	SDB	✔
3/03/2004	Small order surcharge E57135/11	1	$10.00	$10.00	Sang, Robert	3075	2059700	00000	SDB	✔
6/01/2004	CAPACITOR, MKT, 0.01UF 100V	3	$0.16	$0.48	O'Keefe, Steven	2899	MEE1009	MSOKE	LR	✔
6/01/2004	CABLE ACCESSORIES, CABLE TIE, BLACK, 100MM X 3MM	4	$0.02	$0.08	Myhra, Sverre	2904	SCE1009	SSMYH	LR	✔
6/01/2004	SWITCH, PUSHBUTTON, N.O. MOMENTARY BLACK	2	$0.62	$1.24	MicroTechnology, CRC	2901	2048580	00000	LR	✔
6/01/2004	CONNECTOR, CROCODILE CLIP, MEDIUM - RED & BLACK	4	$0.31	$1.24	MicroTechnology, CRC	2901	2048580	00000	LR	✔
6/01/2004	DIODE, 1N5408 1000V/3A	4	$0.18	$0.72	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	CAPACITOR, ELECTROLYTIC, 100UF 350V	2	$2.47	$4.94	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	MAINS, PLUG, 15 AMP 439/15TR CLEAR	1	$2.54	$2.54	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	MAINS, SOCKET, 438TR CLIPSAL EXT. SKT.	1	$4.33	$4.33	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	ENCLOSURE, JIFFY, BLACK, 150 X 90 X 50 MM UB1 (LARGE)	1	$2.93	$2.93	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	TERMINAL BLOCK, NYLON, 12 WAY 5 AMP	12	$0.06	$0.74	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	CABLE ACCESSORIES, CABLE CLAMPS OR P CLIPS, 1/4 OR 6.3MM	2	$0.10	$0.20	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	IC, LINEAR, LM324AN OP AMP QUAD	6	$0.46	$2.76	MicroTechnology, CRC	2897	2048590	00000	LR	✔
6/01/2004	RESISTOR, TRIMPOT, 10K 5MM VERT OPEN CARBON	4	$0.16	$0.64	MicroTechnology, CRC	2897	2048590	00000	LR	✔

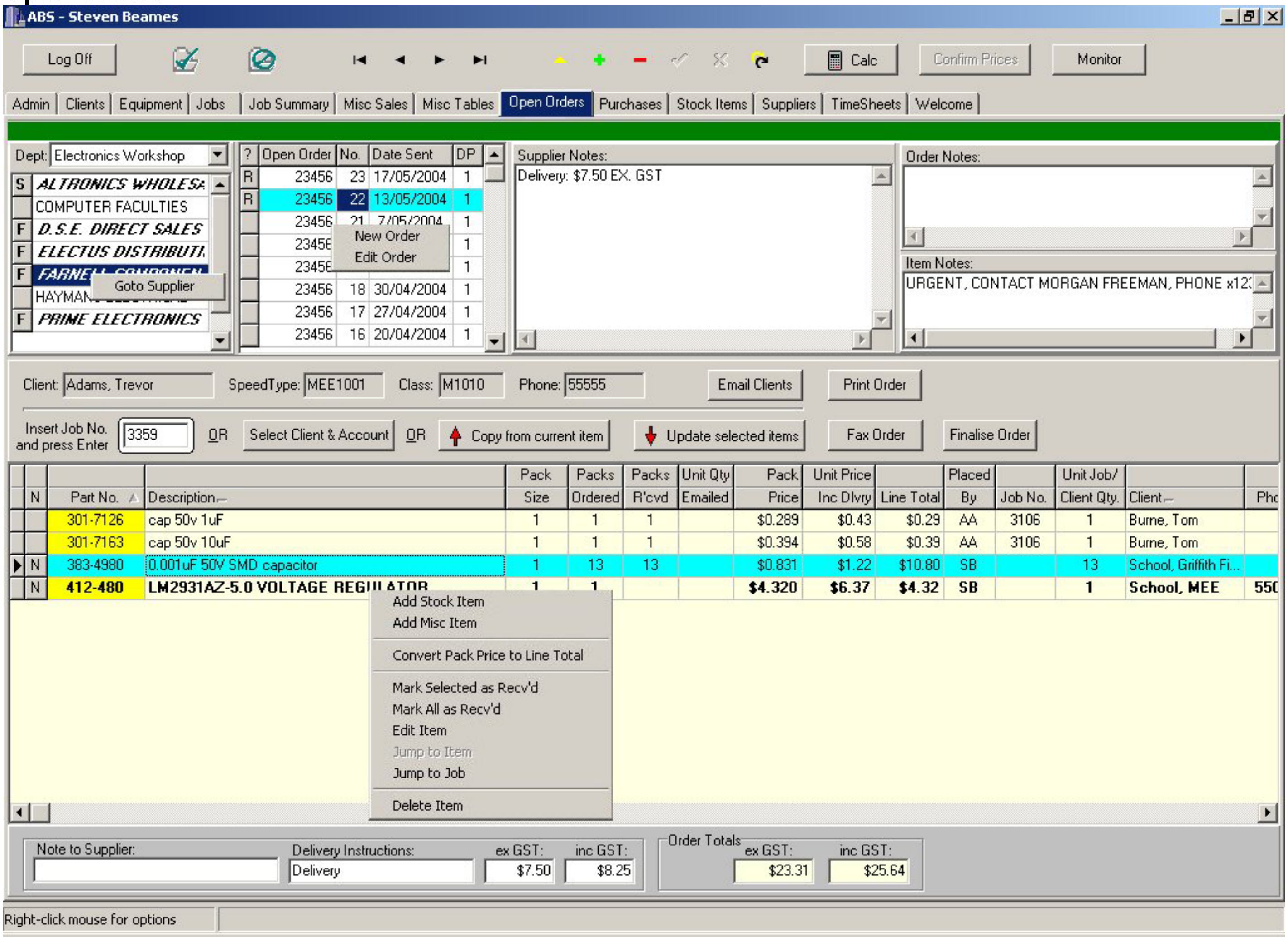
This page records parts supplied or ordered in for clients, other than those for our job requests. Normally only the new items will be shown (where ‘Done?’ is not checked). If we supply a part for use by another workshop or section on their job, we can just enter their job number, and the mark-up will be split between us, and the part and cost is automatically added to their job. When the FBS report is generated, all unrecovered costs for an account code will be summed onto a new job whose description will read like ‘Supply Parts To John Doe’.

Misc Tables –



As the name suggests, miscellaneous details are recorded here for use elsewhere, minimising duplication.

Open Orders –



The top left-hand box lists all the suppliers that a particular OTS section has an open order with. We can add items to another sections' open orders if necessary, and all the financial transfers will be handled without further intervention. Where a suppliers' name is bolded, there is at least one outstanding order that needs to be sent, received, or finalised.

The adjacent box lists the open orders for the selected supplier, with the most recent at the top. The 'Date Sent' is automatically filled once the order is faxed. Until then, any items requested from this supplier will be added to the current unsent order, (else a new blank one will be created automatically). The 'DP' (Delivery Point) column allows the order to indicate non-default delivery instructions if required, as maintained back on the Admin page.

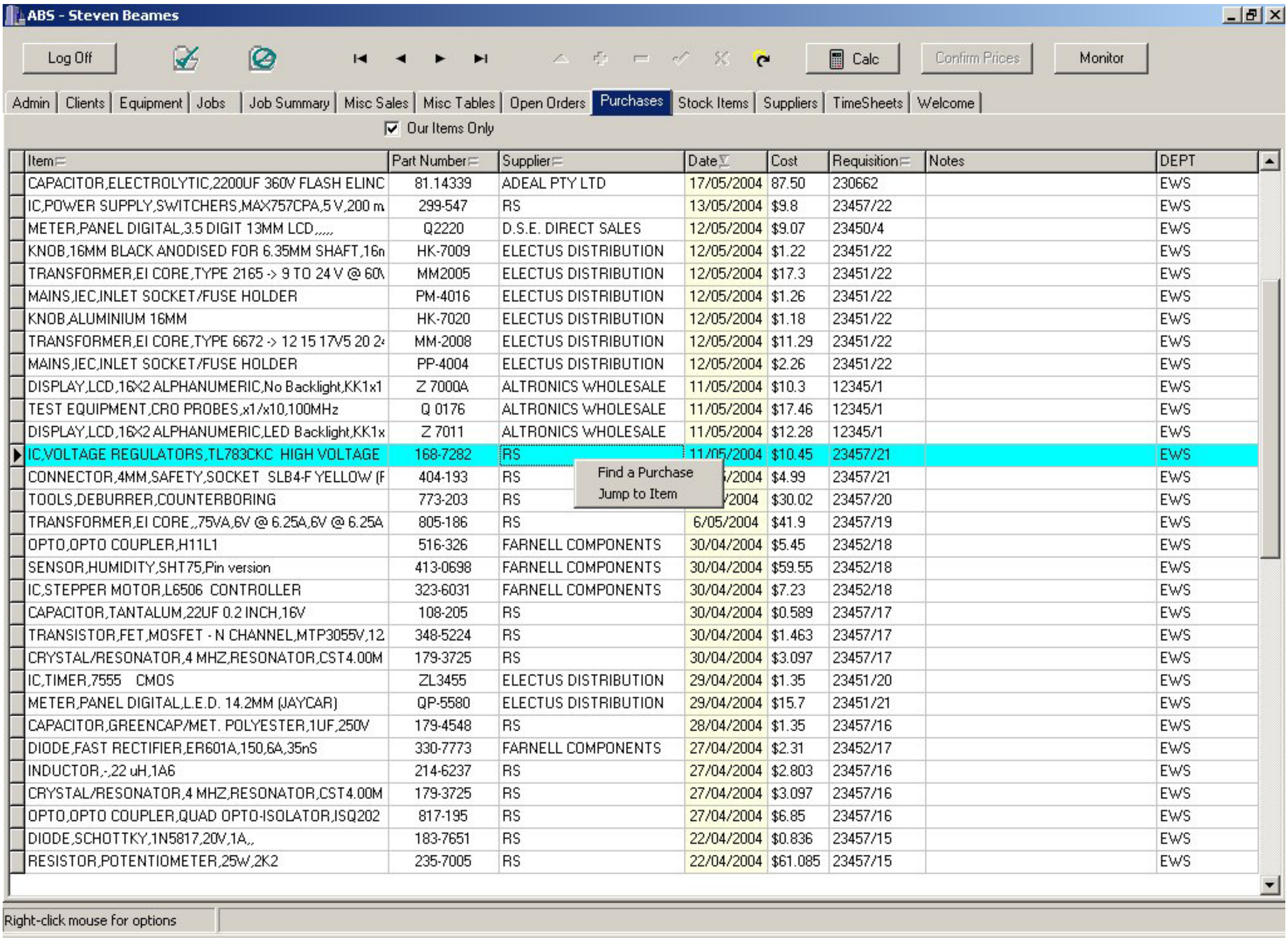
The next boxes display notes relevant to the selected supplier, order, & order item.

The section below this has to have some account or job details filled in before new items can be added to the next order, to ensure that the cost is recovered from the appropriate source. The 'Email Clients' button will generate an editable email for each client who has requested parts (not for a job), listing the parts and advising the client how many of each part has arrived and is available for collection. The 'Print Order' button prints a modified copy of the order for local records (including who requested each item on the order), while the 'Fax Order' button generates the 'pretty' order with the corporate logo for faxing via fax-modem.

The bottom section lists the items ordered & received, and automatically apportions the delivery charges across each item, so that this cost is recovered too. Un-received items are bolded so they stand out, and different font colours are used depending on whether the item is being charged to our own, another OTS sections', or a clients account.

Once all the items have been received, the manager is prompted to finalise the order, which involves deciding which items purchased for jobs should be recorded on the Stock Items page, selecting the categorisation of them, and confirming the new price to be charged for them (with the option to calculate an average price based on current stock levels bought at a different price). Once the order is finalised, parts for a job are moved to either the Stock Items Used or Misc Items Used sections from the Ordered Items section on the Job page, with the adjusted prices.

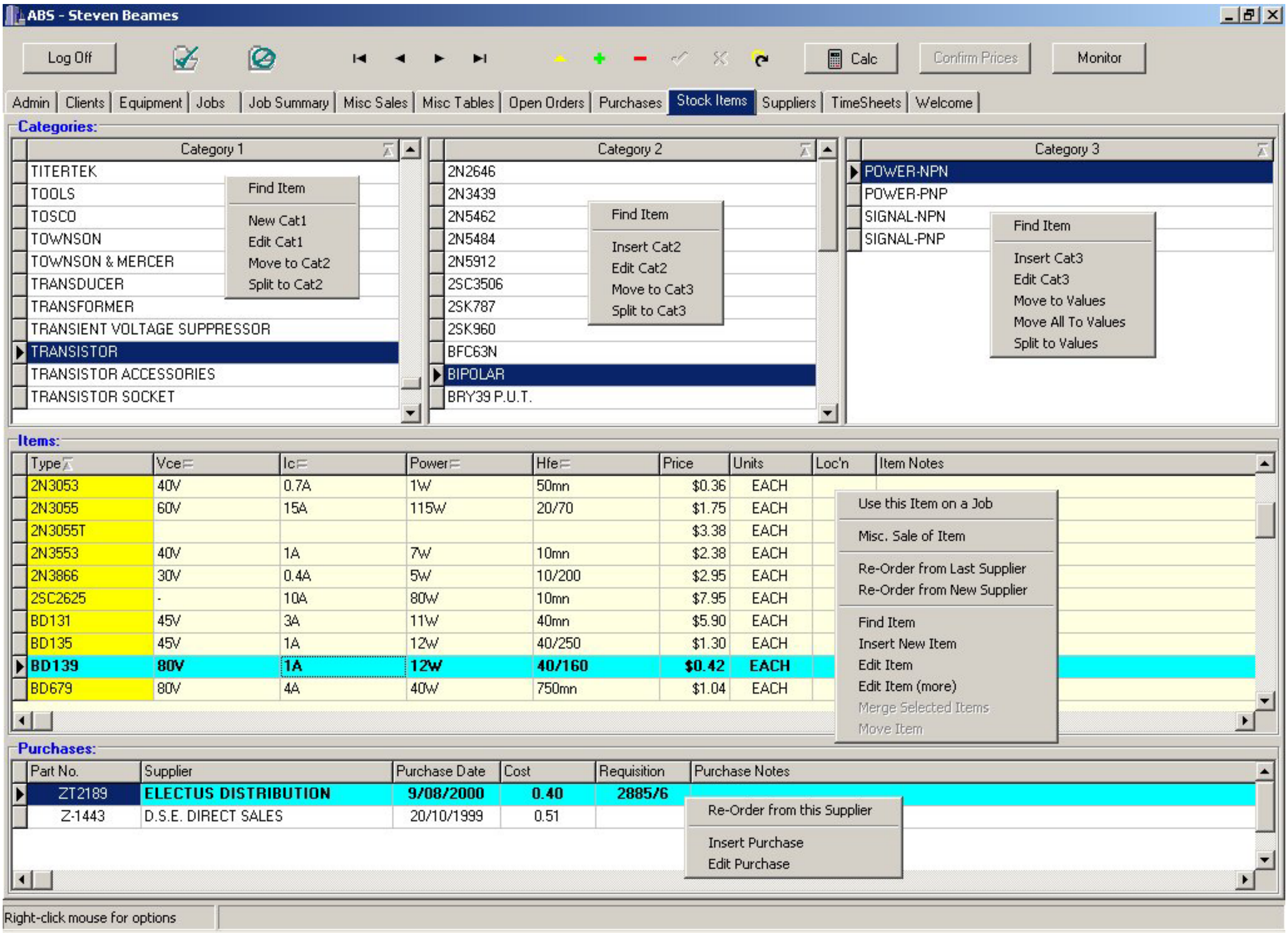
Purchases –



Item	Part Number	Supplier	Date	Cost	Requisition	Notes	DEPT
CAPACITOR,ELECTROLYTIC,2200UF 360V FLASH ELINC	81.14339	ADEAL PTY LTD	17/05/2004	87.50	230662		EWS
IC,POWER SUPPLY,SWITCHERS,MAX757CPA,5 V,200 m	299-547	RS	13/05/2004	$9.8	23457/22		EWS
METER,PANEL DIGITAL,3.5 DIGIT 13MM LCD,,,,,	Q2220	D.S.E. DIRECT SALES	12/05/2004	$9.07	23450/4		EWS
KNOB,16MM BLACK ANODISED FOR 6.35MM SHAFT,16n	HK-7009	ELECTUS DISTRIBUTION	12/05/2004	$1.22	23451/22		EWS
TRANSFORMER,EI CORE,TYPE 2165 -> 9 TO 24 V @ 60\	MM2005	ELECTUS DISTRIBUTION	12/05/2004	$17.3	23451/22		EWS
MAINS,IEC,INLET SOCKET/FUSE HOLDER	PM-4016	ELECTUS DISTRIBUTION	12/05/2004	$1.26	23451/22		EWS
KNOB,ALUMINIUM 16MM	HK-7020	ELECTUS DISTRIBUTION	12/05/2004	$1.18	23451/22		EWS
TRANSFORMER,EI CORE,TYPE 6672 -> 12 15 17V5 20 2	MM-2008	ELECTUS DISTRIBUTION	12/05/2004	$11.29	23451/22		EWS
MAINS,IEC,INLET SOCKET/FUSE HOLDER	PP-4004	ELECTUS DISTRIBUTION	12/05/2004	$2.26	23451/22		EWS
DISPLAY,LCD,16X2 ALPHANUMERIC,No Backlight,KK1x1	Z 7000A	ALTRONICS WHOLESALE	11/05/2004	$10.3	12345/1		EWS
TEST EQUIPMENT,CRO PROBES,x1/x10,100MHz	Q 0176	ALTRONICS WHOLESALE	11/05/2004	$17.46	12345/1		EWS
DISPLAY,LCD,16X2 ALPHANUMERIC,LED Backlight,KK1x	Z 7011	ALTRONICS WHOLESALE	11/05/2004	$12.28	12345/1		EWS
IC,VOLTAGE REGULATORS,TL783CKC HIGH VOLTAGE	168-7282	RS	11/05/2004	$10.45	23457/21		EWS
CONNECTOR,4MM,SAFETY,SOCKET SLB4-F YELLOW (F	404-193	RS	[illegible]/2004	$4.99	23457/21		EWS
TOOLS,DEBURRER,COUNTERBORING	773-203	RS	[illegible]/2004	$30.02	23457/20		EWS
TRANSFORMER,EI CORE,,75VA,6V @ 6.25A,6V @ 6.25A	805-186	RS	6/05/2004	$41.9	23457/19		EWS
OPTO,OPTO COUPLER,H11L1	516-326	FARNELL COMPONENTS	30/04/2004	$5.45	23452/18		EWS
SENSOR,HUMIDITY,SHT75,Pin version	413-0698	FARNELL COMPONENTS	30/04/2004	$59.55	23452/18		EWS
IC,STEPPER MOTOR,L6506 CONTROLLER	323-6031	FARNELL COMPONENTS	30/04/2004	$7.23	23452/18		EWS
CAPACITOR,TANTALUM,22UF 0.2 INCH,16V	108-205	RS	30/04/2004	$0.589	23457/17		EWS
TRANSISTOR,FET,MOSFET - N CHANNEL,MTP3055V,12	348-5224	RS	30/04/2004	$1.463	23457/17		EWS
CRYSTAL/RESONATOR,4 MHZ,RESONATOR,CST4.00M	179-3725	RS	30/04/2004	$3.097	23457/17		EWS
IC,TIMER,7555 CMOS	ZL3455	ELECTUS DISTRIBUTION	29/04/2004	$1.35	23451/20		EWS
METER,PANEL DIGITAL,L.E.D. 14.2MM (JAYCAR)	QP-5580	ELECTUS DISTRIBUTION	29/04/2004	$15.7	23451/21		EWS
CAPACITOR,GREENCAP/MET. POLYESTER,1UF,250V	179-4548	RS	28/04/2004	$1.35	23457/16		EWS
DIODE,FAST RECTIFIER,ER601A,150,6A,35nS	330-7773	FARNELL COMPONENTS	27/04/2004	$2.31	23452/17		EWS
INDUCTOR,-,22 uH,1A6	214-6237	RS	27/04/2004	$2.803	23457/16		EWS
CRYSTAL/RESONATOR,4 MHZ,RESONATOR,CST4.00M	179-3725	RS	27/04/2004	$3.097	23457/16		EWS
OPTO,OPTO COUPLER,QUAD OPTO-ISOLATOR,ISQ202	817-195	RS	27/04/2004	$6.85	23457/16		EWS
DIODE,SCHOTTKY,1N5817,20V,1A,,	183-7651	RS	22/04/2004	$0.836	23457/15		EWS
RESISTOR,POTENTIOMETER,25W,2K2	235-7005	RS	22/04/2004	$61.085	23457/15		EWS

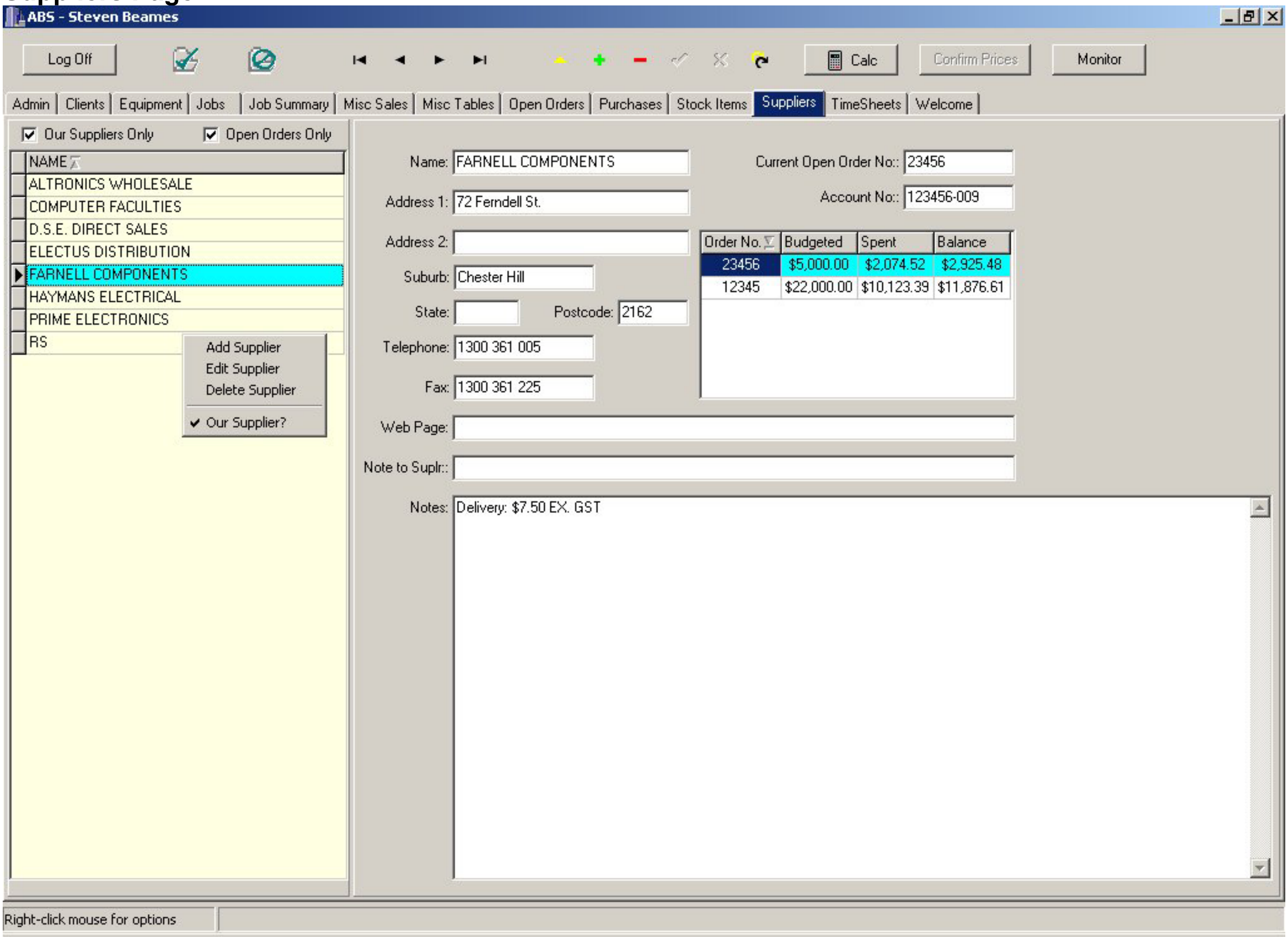
This page is a purchase history of all our 'Stock Items' purchases, sorted initially by purchase date. This table is one of several that can be searched to locate data.

Stock Items –



This page records items that are either held in stock, or have been used on a job and may be required again. The top three boxes are cascading categories of items, while the middle section lists the Items contained in each Category 3, with renamable fields for whatever additional information is useful for future parts selection. The prices here were automatically calculated when the open order purchase was finalised. The bottom section automatically lists the purchase history of each item.

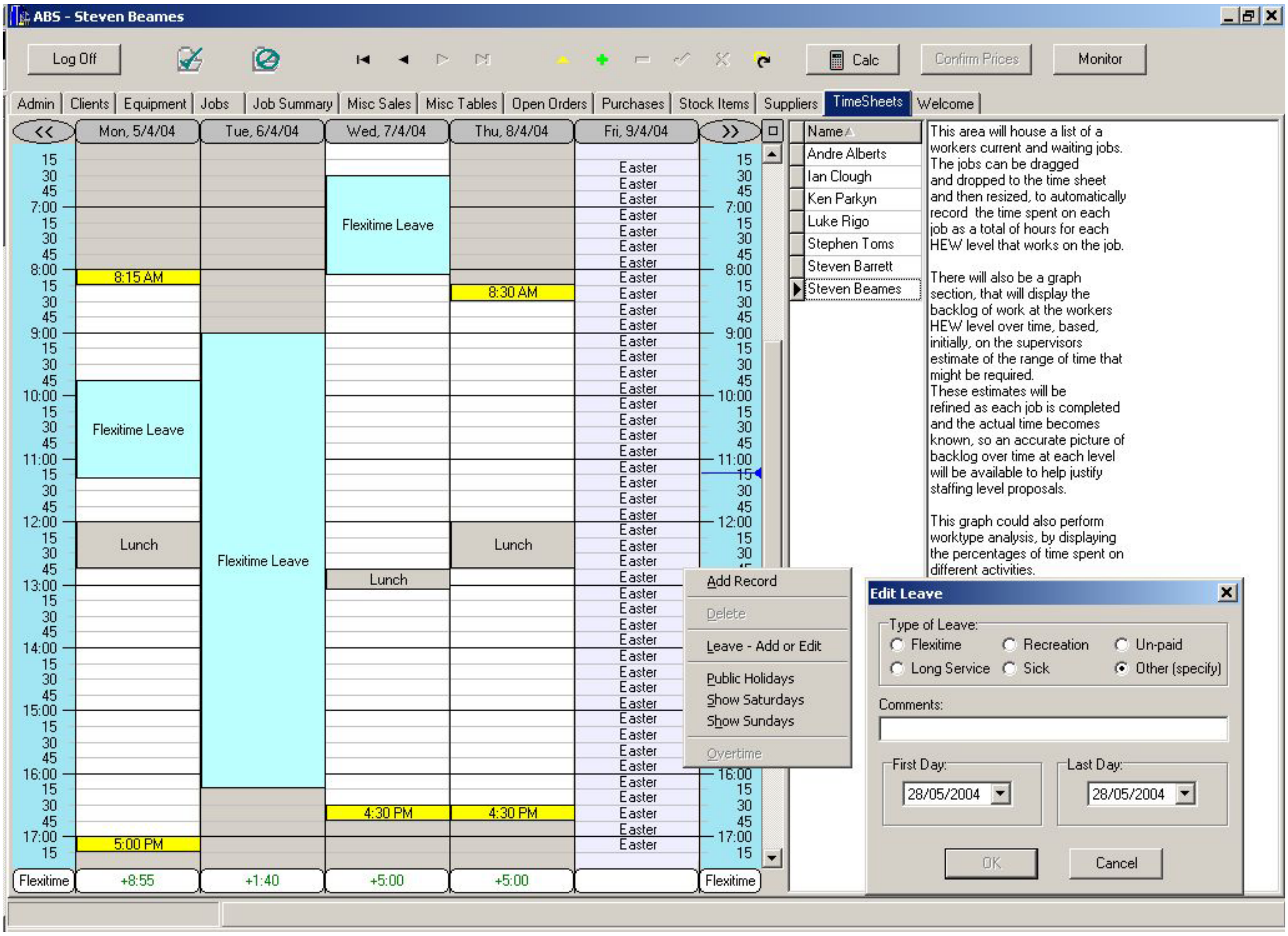
Suppliers Page



This page defaults to displaying just the commonly used open-order suppliers for this section, but you can also browse all your suppliers, or everyone's suppliers, by clearing the checkboxes.

The section at the top-right is where you enter the current open order number (which is what distinguishes the open order suppliers from the rest). The table below this will automatically keep track of how much you've spent so far on each years' open order.

TimeSheets –



The timesheet section lets you record your time graphically by clicking and dragging items, resizing as required. Flexitime is automatically calculated and displayed at the bottom, based on the details entered back on the Admin page. Managers can view any of their staff's timesheets, whilst they can only see their own. Staff can change details for the last couple of days, while managers can edit anything. Future enhancements are listed above on the right. At the moment, this is the default page displayed when staff log-in, to remind them to fill it in.

Conclusions:

Consolidation of most of our administration has proved successful, with few hiccups so far. Staff have accepted using the program, since it saves them time and formalises our procedures, and they frequently contribute suggestions to improve it. Hopefully, further improvements will leave me with virtually nothing to do ;-)