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Preliminary Report on the Local Production of Library Searches*[1]

Abstract: The following report is concerned with members 'real world' practices of searching for materials in libraries. Those practices are 'made visible' from various workstations within the library at Lancaster University - the Service Desk, OPAC terminals and CD-ROM / BIDS workstation - and in terms of the *'lived work'*[2] of searchings* local production. From this perspective, the 'real time' accomplishment of library searches for whatever materials is seen to be the concerted achievement of the library's 'staff' - both employees and clients or users - and as such, searching is treated as a naturally organized social achievement. The purpose of this report then, is to take some preliminary steps towards making members natural 'real world, real time' practices visible thereby making the socially organized phenomena of searching* visible in and as of the endogenous details of its local production. This strand of the report is concerned with the details of searchings* local production in and as the accomplishment of Service Desk work.

Service Desk Organization: Of temporary location and physical arrangement the Service Desk at Lancaster University Library is nevertheless routinely organized into two sections:

♦   one deals with the mundane 'supermarket' work (checking books in and out)

♦   the other with search enquiries and the management of restricted materials

Staff work in both sections on a 'rota' basis with staff spending a scheduled one hour at a time, three hours a day at one of the work-site sections. The scheduling of staff is subject to ordinary workaday contingencies (other members being absent, becoming

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[1] Where search, searches or searching is spelt with an asterisk, for example, searches*, then it is to be read *tendentiously:* as refering to, being indicative of or as standing proxy for an unfolding phenomenon of order - the as yet invisible naturally and locally produced *organizational thing* which is the focal object of the current enquiry.

[2] See Sharrock and Button (1995) for a detailed elaboration of the notion of *'lived work'*.

ill during the working day, the workstation being inundated by users at busy periods in particular, to the effect that it is not uncommon for staff to work four hours a day at the Service Desk, the last two consecutively and usually at the end of the working day in order to deal with 'the last minute rush'). Staff are members of other work specific teams (e.g. registration, reservations, cataloguing etc) to which they return in between Service Desk work. The Service Desk however, is not organized in terms of staffs other specific work team compentecies - i.e. staff are not scheduled on the basis of their other organizational skills and competencies but rather on the basis of their:

◆ having worked in the library for a period of one year

◆ having been successfully 'trained' to accomplish Service Desk work

'Training' is of the 'hands on' variety and consists in the trainee 'shadowing' an accomplished member of staff who then, having introduced the trainee to workstation practices and procedures, 'shadows' the trainee. Training does not consist in any formal tests - a successful trainee is no more and no less than a member of staff who has been successfully acculturated into, and can thus accomplish as a matter of course, the workaday practices and procedures constituent of the workstation and achieving that status is formally recognized in the form of a promotion in grade. All first year members of staff are 'grade one' members. Members of staff who have been successfully trained to accomplish Service Desk work are 'grade two' members. Service Desk staffs formal qualifications are typically of an 'O' and 'A' level standard; informal qualifications consist in work experience in which communication is fundamental to the successful accomplishment of work and although accredited informally such experience is nevertheless a formal criterion of employment. Staff see their job as primarily one of 'helping' or 'giving assistance' to users to the extent to which they characterize 'a lot of the work' as consisting in 'finding out what people want', as 'getting details out of people', as 'trying to find what they're looking for', or more generally, as 'filtering' work. The workstation itself is comprised of six computers providing for 'household management' (specifically regarding borrower details) and access to OPAC (the library's On-line Public Access Catalogue); hard-copy catalogues and reference documents, organizational forms and ledgers, workstation manuals, notices regarding the whereabouts of various catalogue items, various 'frequently asked for' documents (maps, telephone directory's etc), items to be collected or reshelved, service items (e.g. photocopy cards), a bulletin board for displaying member of staffs' 'whereabouts' (or usually where they won't be due to daily contingencies), a bell for summoning assistance in particularly busy periods.

In what follows, transcripts of situated or occasioned instances of staff / user collaborations are employed to 'make visible' the endogenous details of searchings* local production in and as the accomplishment of Service Desk searches. In so far as the accomplishment of library searches increasingly involves the employment of various computer based technologies, analyses of Service Desk transcripts also serve to 'make visible' the details of technologies 'real world, real time' employment in the accomplishment of Service Desk searches.

Occasioned Instances of 'Filtering': The purpose of this section is to make the details of 'filtering' work visible via the analysis of a transcripts of routine Service Desk searches. The aim in analysing transcripts of routine Service Desk searches is to locate the 'trans-situational features' of Service Desk searches, to 'make visible' the recurrent practices, procedures or *methods* constitutive of searchings* local production on any occasion and otherwise illuminate searchings* natural social organization. This will be achieved in and through explicating the 'emergent features' of occasioned instances of Service Desk search talk. Just what this gloss means will, I hope, become apparent as the report progresses. The following sequences of talk are typical and the talk itself is supported by members reflexive accounts[3] :-

CASE 1 SESSION 8 - trans ref: 'breweries'

The following sequence involves two users and two members of staff: -

1) Sharon: could you tell us where market er . what was it . market intelligence
2) Tracy: yeah
3) Sharon: market intelligence
4) Dorian: marketing is C floor (inaudible) do you know how to use the screens
5) Tracy: yeah but ... erm
6) Dorian: you need to find the classmark for the book
7) Tracy: yeah
8) Sharon: its not . its not a book . its erm
9) Dorian: (inaudible)

Dorian leaves the Service Desk and takes the two users to an OPAC terminal and initiates a title search, showing the users how to use OPAC as current search procedure. The title search is unsuccessful and staff returns to the OPAC menu and

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[3] 'Reflexive' here or anywhere else in this paper, does not refer to some 'cognitive' state or account but rather, to members accounts of what was done and what the doing consisted in. 'Reflexive' or 'reflexivity' thus refers to the *ways* in which searching* is locally produced as a phenomena of order this time, last time and every next time. Czyzewski (1994) provides a short but concise account of ethnomethodology's notion of reflexivity.

initiates a serial search yeilding a marketing intelligence classmark. In the course of this work being accomplished the following talk between staff and users occurs.

10) Tracy: its not a book

11) Sharon: its erm .. its . like information . information about er . these particular products and services ... its called market intelligence and leisure intelligence etc etc

12) Dorian: and is that the name of

13) Sharon: that's the name (inaudible) its not a book as such . its usually in the reference library er

14) Dorian: is er. is it a serial

15) Tracy: yeah

16) Dorian: its a serial

Dorian iniates serial search

17) Tracy: its a journal

18) Sharon: its not so much a journal but it does come out every few months

Dorian searching OPAC retrieval list

19) Dorian: is it marketing intelligence and planning . is that the one

Dorian points to item on retrieval list

20) Dorian: T6 its a journal

21) Sharon: no . its not a journal

22) Tracy: unless you might not have it . I don't know

23) Dorian: do you want to check at that

Dorian points to classmark on screen

24) Sharon: been there

25) Dorian: and find the journal itself

26) Sharon: but its not a journal . that's what I've been saying to you .. so if its not that then obviously

27) Dorian: but have you actually looked at the classmark

28) Tracy: yes

29) Sharon: yes

30) Dorian: you've looked at that and its not what you're looking for

31) Sharon: its not what I'm looking for

32) Dorian: right . but that's the title of the book you're looking for . marketing intelligence

33) Sharon: market intelligence ... and its got a . list of all the products and services . its er . basically a reference book . and it tells you about particular market products and services and what to look for

34) Dorian: you've checked in the reference area

35) Tracy: well no

36) Sharon: we've come from the university of central lancashire you see

37) Dorian: right

38) Sharon: we're . we're not here . (laughs) (inaudible)

39) Dorian: let me just check with the subject librarian

Dorian walks back to the Service Desk accompanied by the two users and telephones the subject librarian

40) Dorian: he's not in his office so I've just bleeped him so I'll just wait and see if he comes back

Dorian waits for a reply for approximately one minute- no reply comes and Dorian goes over to another member of staff. They talk briefly - the conversation with the other member of staff is a 'consultatation' she says regarding the the possible whereabouts of current search items - the 'consulted' member of staff is an 'older librarian', which is to say that she has worked in the library longer and has a greater amount of organizational knowledge or 'knows more about the place' in Dorian's words. Having consulted the 'older librarian' , Dorian returns to the users and takes them to the reference area, returning to the Service Desk some three or four minutes later.

41) Researcher: have you found it

42) Dorian: breweries . she was after in the end

43) Researcher: breweries

44) Dorian: now would you have guessed that from what she was saying

45) Researcher: no chance

46) Dorian: no . there was nothing in the reference area so I went back to OPAC

Dorian went on explaining two further OPAC searches employed to the specific end of eliciting further search details, the latter of which resulted in a successful classmark retrieval

Emergent Features: At first glance filtering work consists in the elicition of specific search details from users, details which in the first instance are *specifically vague*:

11) U 1: its erm .. its . like information . information about er . these particular products and services ... its called market intelligence and leisure intelligence etc etc

The first task in accomplishing a Service Desk search then is to make those specifically vague details *available* or *visible*

14) S: er . is it a serial

Making specifically vague details visible is constitutive of filtering work then, and a routine, *methodical*, achievement. This section of the report is concerned in illuminating the details of that achievement. As the following extract from the above sequence of talk instances, the library's on-line catalogue is integral to the work of filtering for in trying to make the specifically vague specifically available, staff employ OPAC as a means of eliciting search details from users:

Staff performing a title search

10) U 2: its not a book

11) U 1: its erm .. its . like information . information about er . these particular products and services ... its called market intelligence and leisure intelligence etc etc

12) S: and is that the name of

13) U 1: that's the name (inaudible) its not a book as such . its usually in the reference library er

Staff aborts title search

14) S: er . is it a serial

15) U 2: yeah

16) S: its a serial

Staff iniates serial search

17) U 2: its a journal

18) U 1: its not so much a journal but it does come out every few months

Staff searching OPAC retrieval list

19) is it marketing intelligence and planning . is that the one

Staff points to item on retrieval list

20) S: T6 its a journal

21) U 1: no . its not a journal

At this point the staff has not managed to make the specifically vague visible, however, staff's efforts thus far nevertheless serve to illuminate the prima facie purpose of technology's employment in the accomplishment of filtering work: staff use OPAC as a *tool providing a means of making the specifically vague specifically available*, as a means for eliciting enough detail from users so as to be able to identify search materials - an achievement which consists in the *categorization* of elicited user descriptions (e.g. 'is it a serial', 'its a journal' or 'its not ...' as the case may be). The on-line catalogue is, in the first instance, employed as a tool for eliciting descriptions of search materials and as a means of categorizing those descriptions then. The issue is: how is that work achieved, what does that achievement consist in ?

Eliciting search details and categorizing users descriptions is a routine accomplishment consisting in the application of organizational procedures other than purely technological ones, which is to say that the elicitation of search details and

categorization of users descriptions is an achievement consisting in practices other than the *methodical* application of OPAC. These practices or methodical procedures are not exclusive, on the contrary they are applied in conjunction with technological procedures.

Although not evident in the above sequence of talk, one of the most common methods of eliciting search details and categorizing users descriptions is to employ user lists. Lists may be hand written and consist in prior search details (usually *partial* search details - e.g. author's last name, title of a journal in which an article is in, an ISBN number etc) or details retrieved from elsewhere (from conversations with colleagues and with others wherever and whenever, from books, journals, and newspapers etc), or they may be photocopied course reading lists. Whatever the format, lists are procedurally employed in order to elict search details and thus accomplish the categorization of users descriptions as the following extract instances:

11) S: okay . and subject librarians . when they're in and available so . but this is your main .. topic is it

12) U: yeah

13) S: (*looking at list*) it sounds more like figures and graphs and things

The above extract also instances another feature of lists: lists are orientated to as*descriptions* of search materials. As with OPAC then, lists are employed as categorization devices, as artefacts affording the categorization of search materials. Employed in this manner, lists are supported by users knowledge of search materials. This knowledge is furnished in a number of ways such as through conversations with friends or personal familiarity with search materials, though significantly, knowledge of search materials is often furnished via lectures, seminars and related conversations.

Users knowledge of search materials has to be elicited and has to be elicited in such a way as to afford *specific* categorization - 'figures and graphs and things' for example, has to be turned into something more tangible if search materials are to be identified and located. A list is an artefact which often affords the provision of 'preliminary' or 'loose' catagorizable descriptions of search materials through its methodical employment as a search detail elicitation tool then. Turning those 'loose' categories into search specific categories typically consists in employing the on-line catalogue, as the 'marketing intelligence' example illustrates, to elicit further details from users in order to establish search specific categories. Before proceeding to the details of technological procedure it should be noted that in the absence of lists staff and users routinely attempt to establish 'preliminary' search categories through elicition / provision of either prior search details or knowledge of search materials.

The way in which the transition from list to catalogue, and thus 'loose' to specific is achieved can be seen in following instance:

3) S: what have you got . is it something you've got written down

4) U: yeah . em I'm trying to find out about this (*shows staff a typed list*) this part here

13) S: (*looking at list*) it sounds more like figures and graphs and things

14) U: yeah

15) S: aren't they .. um . we'll see what we get just looking under 'title' (*iniates OPAC search*)

22) S: it could be that its worth looking around that .. oh that's a video . that's not very helpful . really .. its an ancient one as well (inaudible) erm .. (inaudible) class mark A . it could be . er (*types in search commands - searches for approx 23 seconds*)

23) & 24) *Both look at display making inaudible comments*

25) S: its more to do with science

26) U: um

27) S: ooh . hey look ... right (*pause - approx 5 seconds*) um that's putting you more in the physics area I think . I think if you don't find it in science what could be worth you looking at is . er . having a word with the subject librarian

28) U: yeah

29) S: there are a lot of maps that give . er ... I don't know what you're looking for

Taping interrupted - approx 30 seconds - staff still searching OPAC

30) I think we'll send you to the librarian . cos with me browsing like that .. the subject is quite specific

In and through 'browsing' the on-line catalogue, staff and user *make* a specifically vague object that 'looks like graphs and things' into something that's 'more to do with science' and 'more in the physics area'. This categorization work is more often than not achieved in and through staffs characterization of on-line display items and in users affirming, disagreeing, indicating verisimilitude ('sort of', 'kind of' etc) with those categories, particularly through the use of interjective particles ('yeah', 'huh-huh', 'er' 'uh-uh', 'mmm' etc) although users often and intentionally provide categorizable characterizations of search materials particularly when they encounter search 'difficulties' (i.e. when the 'browse' procedure has failed to produce enough details to afford the categorization of search materials or when staff don't know how to categorize search details). The following extract instances the categorization of search materials in and as of such circumstances:

43) U: so . I got that one .. what about these ward lock guides .. what . what would I put in there

44) S: er

45) U: er . the guide books . like travel guide books

46) we don't have a lot of just that sort of thing . I would think if ... was it a specific one you were looking for

50) S: are they more like a tourist guide

51) U: it would be like a tourist guide . early tourist guide nineteen hundred and . nineteen . yeah probably . early nineteen er . twentieth century

52) S: have you tried using the first three options on the computer to see if

53) U: I put ward lock in and nothing

54) S: yeah

55) U: nothing . sort of came up

56) S: I mean I actually haven't seen these sort of things

73) U: but these ward lock guides

74) S: those . I'm honestly not sure

75) U: they're like travel .

76) S: I mean

77) U: travel guides . er . of the Lake District. y' know . where to . where to walk . and

78) S: yeah

79) U: a bit more information

80) S: I mean we can try playing around with the computer

The above examples not only reveal that technology's methodical application consists in 'browsing' the catalogue in order to elicit search details providing for the categorization of search materials, but also, that the purpose of that procedure - of eliciting details through 'browsing' the catalogue and of establishing search categories in and through that activity - is to establish the *identity* of search materials or otherwise establish *'solutions'* to *'problems'* of identity:

30) I think we'll send you to the librarian . cos with me browsing like that .. the subject is quite specific

In this case, the referal of the user to a subject librarian who has specialist knowledge of the search area, the identity of which has just been establish in and through browsing the catalogue and categorizing the display items. In other words, in its methodical application as a filtering tool, OPAC allows for the 'narrowing down' of the search through the 'browsing' based elicitation and categorization of specifically vague search details thereby providing a possible solution to the problem of identity in so much as a specific search area has been established even though specific search materials have yet to be identified.

The above also suggests that in its application as a filtering tool, technology provides a *warrant* for either the continuation or discontinuation of a search. The following extract makes the existence of that warrant clearly visible:

Staff searching OPAC retrieval list

19) is it marketing intelligence and planning . is that the one

Staff points to item on retrieval list

20) S: T6 its a journal

21) U 1: no . its not a journal

22) U 2: unless you might not have it . I don't know

23) S: do you want to check at that

Staff points to classmark on screen

24) been there

25) and find the journal itself

26) but its not a journal . that's what I've been saying to you .. so if its not that then obviously

27) S: but have you actually looked at the classmark

28) U 2: yes

29) U 1: yes

30) S: you've looked at that and its not what you're looking for

31) U 1: its not what I'm looking for

32) S: right . but that's the title of the book you're looking for . marketing intelligence

33) U 1: market intelligence ... and its got a . list of all the products and services . its er . basically a reference book . and it tells you about particular market products and services and what to look for

34) S: you've checked in the reference area

35) U 2: well no

36) U 1: we've come from the university of central lancashire you see

37) S: right

38) U 1: we're . we're not here . (laughs) (inaudible)

39) S: let me just check with the subject librarian

In its methodical application technology is orientated to, both by staff and users on occasion, as providing for the orderliness and expected orderliness of search* activities then; as providing 'reason' and 'justification' etc for *this* and the *next* action in and as situated details of its employment.

Achieving the categorization of search descriptions in and through the methodical employment of lists and the on-line catalogue is not, as was earlier remarked, the purpose of filtering work. In so far as lists and the on-line catalogue are employed in accomplishing filtering work then they are employed in order to facilitate or provide for the *formulation of the identity of search materials* or the *formulation* of

solutions to problems of identity - specifically, with regard to the latter and to paraphrase one member of staff, to problematic circumstances in which 'we know what area to look for the materials in but not what those materials look like exactly'. The methodical employment of lists in eliciting prior search details and user knowledge of search materials provides for the achievement of establishing preliminary categories in and through the production of categorizable search descriptions. In the absence of lists the catalogue itself may be employed for the same purpose. However, the work that provides for browsing - the employment of lists as descriptions of search materials or as a tool providing for the elicitation of categorizable search descriptions - does not itself provide for the formulation of identity or of solutions to problems of identity, but rather, provides for the formulation of search categories. It is the categories that are formulated in and through the work that provides for browsing and the work of browsing itself that provide for the formulation of identity and of solutions to problems of identity. The point to note here then is that the on-line catalogue is orientated to, as evidenced in the details of its 'real time, real world' employment, not so much as a locational device but as an artefact providing for the formulation of search categories which provide for the formulation of the identity or solutions to problems of the identity of search materials. This is not to say that the on-line catalogue is not employed as a locational device but rather, that this is the work that 'unavoidably' presupposes locating search materials. It might otherwise be said that *finding* search materials in 'real-time':

♦ consists in formulating search categories

♦ consists formulating the identity or solutions to problems of the identity of search materials

and that on-line library catalogues, are specifically employed along with other artefacts towards these ends.

The 'breweries' transcript shows that the formulation of search categories and of the identity or solutions to problems of the identity of search materials is a concerted achievement, involving and indeed being the product of *multi-party* collaborations between staff and users. In this particular instance the users collaborate specifically in formulating the search category - this is a *distinctive* feature of multi-user search enquiries - and staff collaborates with other members of staff in formulating a solution to the search problem [the problem, to be sure, being that of formulating category and identity]. *Staff-to-staff collaborations are integral to searchings* local production then*, and the aim in this part of the report is to 'make

visible' the organizational details that provide for the occasioned accomplishment of filtering work:

3) U: well my problem was I want ... I like visual art so I just wanted to look through the section . is it on the shelf or not

4) S: not if it said 'ask enquiries' . its probably one that's actually er .. on restricted access and we'd have to go and get it for you

14) S2: what was the class mark .. 98 were it

15) U: er ... it was .. I just . just tried chinese art and I got 'ask enquiries'

S2 initiates OPAC search

16) S: (*talking to S2 - reference to OPAC display*) uh that could be anyone but they'd be one ... ones at different

17) S2: S5B

20) U: it was just . I just want er . uh . to look at pictures as well

21) S: mmm . mmm

22) U: erm

23) S2: well that's going to be the class mark so I would think (inaudible) is going to be at V 3 little R D

25) S2: that's smashing .. class mark . for chinese art

26) S: yeah .. but is .. so

27) S2: its a (inaudible) section

28) S: yeah

29) U: is it oversize

30) S: that's it . yeah

31) S2: you want the size and (inaudible) or anything sort of 'ask' ... it wasn't a slide set that said 'ask enquiries' was it

37) S: your books should be there actually . shouldn't they [V 3 little R D]

38) U: right .. okay

In this extract, and what occurs there-in is not untypical, staff collaborate a) in formulating the search category (utterances 14-17), b) in formulating a solution to the problem of identity (utterances 16-23) and c) in attempting to reformulate the identity of the search materials. Before proceeding two points are worth noting: one, that the catalogues organization (classmark) is integral to the formulation of identity and solutions to problems of identity and two, that identity is a temporally unfolding achievement in and as details of the application of problem solving procedures. To

continue, at its most mundane level, though nevertheless of significant import, what provides for the accomplishment of filtering work is the simple *physical* organization of the Service Desk which is routinely staffed by three members at a time. The physicality or *ecology* of the workstation affords routine collaboration in accomplishing filtering work in that the layout of the workstation allows members of staff to 'be at hand' for one another, and in so doing the ecology of the workstation affords specifically, the *here and now* collaborative application of organizational knowledge in formulating categories, identity and solutions to problems of identity. The collaborative formulation of search categories, identity and solutions to problems of identity is a routine feature of searchings local production in and as of the accomplishment of Service Desk work. More will be said about this aspect of the work in due course, suffice to say for the time being that the workstation's ecology is integral to the searchings effective accomplishment.

Organizational knowledge providing for occasioned formulations is itself provided for in routine ways. The physical relations of members of staff is one way, affording not only 'solicited'[4] collaborations between staff and 'unsolicited'[5] collaborations but also affording what might be called 'organizational gossip' providing for the distribution of organizational knowledge. The following extract which occured after the 'breweries' instance makes the point at issue:

1) Staff 2: what did she want . what did she ask for

2) Staff 1: marketing intelligence

3) S 2: marketing intelligence

4) S 1: which is a joke (inaudible) she didn't want that . I eventually got out of her that it was

5) S 2: breweries she was

6) S 1: yeah

7) S 2: yes

8) S 1: yeah which we've got some in the reference area

9) S 2: have we . what classmark . did Keith

10) S 1: UBQ . 1UBQ

11) S 2: did er . Keith put it there

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[4] i.e. collaborations that are requested: 'do you know ...', 'how do you find ...', 'where are ...' etc - sayings and thus doings which are more often than not orientated to by co-workers as *requests for assistance* in accomplishing occasioned formulations as opposed to requests for 'information exchange'

[5] i.e. voluntary interventions on the part a member of staff not initially involved in the searches production: 'what was the class mark .. 98 were it', 'it used to be at options one didn't it' , '91 census . are they on CD-ROM' etc - sayings which are more often than not provided as *offers of assistance* as opposed to 'information exchanges', and provided on the basis of *hearing* that a co-worker is 'struggling', for want of a better word, in achieving a search formulation be it category, identity or solution

12) S 1: probably

13) S 2: has it got his name in

Pause - approximately five seconds

14) S 2: there's something upstairs .. urh I've forgotten what its called . and it has all different . different things y' know there's . like clothing and all the different things . its called retail

15) S 1: retail trends isn't it

16) S 2: yes . retail trading or something like that anyway

17) S 1: yeah

18) S 2: and that's all divided up into different commodities

In affording 'organizational gossip', the workstation's ecology provides for the *informal* distribution of organizational knowledge then, and in so doing provides for the accomplishment of occasioned formulations. It may be noted that the distribution of organizational knowledge providing for occasioned formulations is supported *formally* through hard-copy catalogues located in the workstation, workstation notices and memo's, bulletin boards and a weekly staff meeting. It may also be noted that in accomplishing filtering work staff routinely orientate to the working division of labour as a problem solving resource: to co-workers, assistant librarians, the Service Desk supervisor, subject librarians and senior librarians. Co-workers are typically the first to be 'consulted', whether on a solicited basis or otherwise, in accomplishing problem solving. The next typical recourse is to Service Desk staff who are 'off-duty' but 'to-hand'. Subject librarians are orientated to by Service Desk staff *if and when* the identity of the search *area* has been formulated. Assistant librarians and the Service Desk supervisor, who are located in offices next to the Service Desk, are orientated to in cases where enough search detail has been elicited to warrant the continuation of the search but staff 'aren't sure' how to solve the problem as are the senior librarians (senior librarians are not immediately located in relation to the Service Desk).

Having established the identity of search materials in, through and as of the work of occasioned formulation vis-a-vis filtering work, the next step in any search is to locate the identified search materials. Locating search materials is an 'organizational'matter: a matter of knowing the catalogues 'layout' and / or of knowing how materials are catalogued and indexed; a matter, in other words, of knowing how to *navigate* the catalogue. The aim in this part of the report is to 'make visible' some of the work productive of catalogue navigation in and as of the accomplishment of Service Desk work.

Navigating the catalogue, like accomplishing filtering work, is first and foremost a concerted achievement consisting in reciprocal multi-party collaborations in and between staff and users / users and staff. The following extract instances how navigation is routinely accomplished in the course of performing Service Desk work:

2) User: hi . I'm wanting census figures

7) S: (inaudible) are they on CD-ROM now . 91 census

8) S 2: sorry

9) S: 91 census . are they on CD-ROM

11) S: no . or are the ones upstairs on OPAC

19) S 2: is there the whole country . I don't know whats on there either

20) S: I think the whole country's on isn't it

S2 looks around workstation for another member of staff to 'consult'

21) S 2: nobody around

Both members of staff go to find somebody to consult in another nearby workstation - before they get there they 'bump into' a member of staff who works on the Service Desk but is currently engaged in another task and as such is just 'passing through' the Service Desk workstation. The three members of staff initiate several OPAC searches, drawing specifically on the third members organizational knowledge

22) S: sorry to keep you waiting .. well the most up-to-date ones are upstairs

23) U: right

24) S: on CD-ROM .. and they should cover the whole country

Staff routinely 'consult' one another in and as the work of navigating the catalogue. Typical 'consultations' are co-worker orientated and consist, specifically and notably, in employing members accrued workaday organizational knowledge. Staff accrue organizational knowledge not only through being trained to accomplish Service Desk work but also, and significantly, in and through accomplishing other routine workaday tasks such as cataloguing, reshelving, physically retrieving materials for users etc. By way of example, the following extract instances the point in case:

52) S: have you tried using the first three options on the computer to see if

53) U: I put ward lock in and nothing

54) S: yeah

55) U: nothing . sort of came up

56) S: I mean I actually haven't seen these sort of things

57) U: haven't y'

58) S: no because I shelve in that area

59) U: I've been told

60) S: but

61) U: to look in second hand book shops y' know . for them . y' know

62) S: yeah I mean all of these where they're showing y' volume number

63) U: yeah

64) S: although it doesn't say journals . you would expect to find that . at option six . that journal serials title

Navigating the catalogue in and as of details of accomplishing Service Desk work a) relies on, and in 'real time' is significantly constituted in and through, staff orientating to and employing their workaday knowledge of the catalogue then and b) relies on staff orientating to and employing *each others* workaday knowledge of the catalogue as a matter of course. The significance of this work in achieving navigation in and as of the accomplishment of Service Desk work is that it is *informally* provided for. The knowledge is tacit and the work seen but unnoticed, taken for granted but nevertheless integral to navigations achievement and underpins all *formal* navigational procedure whether the latter be 'technical'[6] or 'organizational'[7] .

Achieving navigation on any occasion 'unavoidably' consists in the informal employment of tacit knowledge accrued in and through the accomplishment of routine workaday tasks and is, in situated 'real time, real world' searching, more often than not a collaborative activity afforded in this instance by the workstations ecology and the 'to-handness' of significant others in and as of the working division of labour. It might also be noted that navigating the catalogue is, with no time-out, passing or postponement, an *irremediable* collaborative achievement. That irremediability is a consequence of the fact that no single person, no matter how familiar with the catalogue, knows the catalogue 'inside out': what any competent member (be it staff or user) does know however, is how to find their way around the catalogue and that consists, when navigational problems arise, not so much in knowing how to perform technical procedure but rather, in knowing where to go and who to see in order to find their way around or otherwise, in knowing how to find out where to go and who to see in order to navigate the catalogue. The points to note here then are:

♦ that navigating in and as of the accomplishment of Service Desk work is *unavoidably or irremediabley collaborative* in that and precisely because knowing the catalogue is a distributed phenomenon

♦ that navigating in and as of the accomplishment of Service Desk work *relies on* staffs tacit knowledge of the catalogue accrued in and through the accomplishment of routine workaday tasks

♦ that the ecology of the workstation *affords* navigational collaboration

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[6] i.e. formal navigational procedures such as 'author-title' searches and associated technical operations.

[7] i.e. formal navigational procedures such as orientating to the working division of labour - assistant librarians, supervisors, subject and senior librarians etc - hard-copy documents and forms etc.

♦ that the working division of labour is orientated to as a *solution* to navigational problems.

A further feature of navigational work is the employment of hard-copy documents and catalogues. These are employed in finding special collection materials. Users typically perform an OPAC search which instructs them to 'ask enquiries'. Staff retrieve the classmark, either by re-running the search or taking list details and use the hard-copy catalogues to locate the search materials. A notable feature of this type of navigation is that certain items listed in these catalogues are marked with a tick (√). The tick indicates that such items are on 'restricted access' and that specific procedures must be applied / followed in making search materials so marked available to users. The category 'restricted access' also indicates to staff the search materials location . The points to note here then are: that the tick tells staff where to find search materials, it stands, as the OPAC search category 'ask enquiries' stands, as a proxy signpost and in its utilization instances a) the reliance in navigation's production and / or achievement on local knowledge; b) and reflexively, that in its reliance on local knowledge in its production, navigation in and as of the situated accomplishment of Service Desk work is an organizationally structured and structuring activity.

The 'real time, real world' details in which filtering and navigation work consists reveal a further aspect of technologies methodical employment in and as of details of accomplishing Service Desk work. Specifically, that in the accomplishment of occasioned formulations and navigation work, staff *instruct* users how to go about accomplishing OPAC searches, teach them the technical procedures to apply or follow and how to otherwise go about locating search materials:

4) U: yeah . em I'm trying to find out about this (*shows staff a typed list*) this part here

5) S: err (*looking at list - approx 6 seconds*) have you tried using the computer at all

6) U: er . well

15) S: aren't they .. um . we'll see what we get just looking under 'title' (*iniates OPAC search*) cos that's (inaudible) (*turns screen towards user*) there's a few . options you can use really on the computer . you've got keyword search . you've got subject search

16) U: yeah

17) S: and once you find a relevant class mark area for the subject

18) U: yeah

19) S: y' know . then you can look on the shelves to see if its available . er ... what have we got

Teaching and reciprocally learning technological procedure is a ubiquitous feature of searching*, occuring at the Service Desk not only in the course of filtering and navigation work but also through Service Desk enquiries at the other workstations in

the library. More will said about this issue in the next strand of the report, suffice to say for the time being that perhaps the most notable feature about teaching and learning technological procedure is that procedure is typically taught and learnt *informally* and always in relation to the *task at hand*. The point to be made here is that technology - and I am here refering specifically to on-line catalogues - is employed multi-purposely in searchings* local production and not simply as a locational device. We have seen, for example, that technological artefacts are employed and / or orientated to in the accomplishment of Service Desk work: to elicit search details from users in order to formulate search categories, the identity of search materials and solutions to problems of identity; to provide for the orderliness of searching and next search action; as instructional devices in and as of details of accomplishing filtering and navigational work.

<u>Transituational Features</u>: The Endogenous Details of Searchings* Local Production in and as of the Situated Accomplishment of Service Desk Work

The Occasioned Corpus[8]: *'The chief purpose of the notion of the occasioned corpus is to "reduce" [in a phenomenological vein] the features of everyday social settings to a family of practices and their properties.'* Zimmerman, D.H. and Pollner, M., 1973: 98.

From the researcher's methodological perspective, every social setting is a situated, practical, intersubjective achievement, the recurrent product of members own work and only their work always. In so much as this is the case, each social setting is treated as an occasioned production exhibiting its own unique features, features in and through which members not only recognize a setting as the setting that it is but also produce and reproduce that setting. These unique features constitute the occasioned corpus - they are productive, recurrently and in this instance, of searchings accomplishment in and as of the accomplishment of Service Desk work. In assembling the occasioned corpus an account of just how searching is naturally organized and thus locally produced in and as of that work this time, last time and every next time - given the continuity of that particular accomplishment's current social organization - is thereby furnished.

As was noted in the introduction to this report - Service Desk Organization - staff characterize 'a lot of the work' they do in the accomplishment of Service Desk work as consisting in 'finding out what people want', as 'getting details out of people', as 'trying to find what they're looking for', or more generally, as 'filtering' work. Through the analysis of transcripts of routine Service Desk talk and members

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[8] See Zimmerman and Pollner (1973) for a detailed if somewhat arduous explication of the notion of the Occasioned Corpus.

reflexive accounts, 'filtering' reveals itself to be a 'gloss' for the establishing the identity of search materials and / or finding solutions to problems of identity. That work typically consists in making users 'specifically vague' search enquiries 'specifically available' or visible in and through the <u>elicitation of categorizable search descriptions</u> (CSD's). The elicitation of CSD's is achieved in and through the procedural employment of 'lists' as CSD's in-themselves or, failing that *in vivo* identification, as artefacts providing for the elicitation and subsequent identification of search details as CSD's. CSD's elicited in and through the employment of lists are often of a 'preliminary' status and in and as of that achievement afford or provide for the procedural employment of the on-line catalogue (OPAC).

OPAC is procedurally or methodically employed as an artefact for eliciting *further* search details from users for the purposes of elicting 'specific' CSD's. The procedural or methodic details of this achievement consist in 'browsing' the catalogue - i.e. in staff initiating OPAC searches on the basis of the 'preliminary' CSD's thus far elicited and employing retrieved search items to 'narrow down' the search area. In narrowing down the search area through browsing, staff and users produce increasingly more 'specific' CSD's in and through characterizing retrieved and displayed on-line items, and the further search details those items elicit. Further search details are characterized on the basis of staffs workaday knowledge of the catalogue (classmark content etc) and on the basis of users knowledge of search materials (which may consist in the elicitation of the details of a prior OPAC search).

In eliciting CSD's through the methodical employment of lists and the on-line catalogue, staff and users reflexively formulate search categories. It might otherwise be said that <u>the point and purpose of eliciting CSD's, 'preliminary' and 'specific', is to produce search categories</u>. Search categories are produced in and through the methodical employment of lists and the on-line catalogue, in and through members (staff and users) local and contingent knowledge, and in terms of the 'existing'[9] CSD's thereby produced on the*occasion* of a search enquiry. Search categories are produced in order to provide:

♦ for the formulation of the identity of the search area

♦ for the formulation of the identity of search materials

Formulating the identity of the search area and / or of search materials is achieved in and through staffs professional knowledge of the catalogue, specifically in, through and as of their knowing how materials are catalogued and indexed or 'classmarked'.

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[9] i.e. in terms of the 'preliminary' CSD's and every *further* more 'specific' CSD thus far produced, or, in other words, in terms of the CSD's that are 'to-hand', available through their in vivo production*here and now*

The formulation of search categories (e.g. 'chinese art' or 'more in the physics area') allows staff to formulate the identity of the search area or search materials (e.g. V3rD or BA). <u>The formulation of the identity of search areas or search materials consists in staff assimilating search category and classmark and is a temporal achievement</u> in that the formulation of identity often consists in further browsing of the catalogue in order to elicit further details providing for further CSD's, providing for the formulation of further search categories, providing for the formulation of increasingly distinct search area or material identities.

Search categories may be 'specific' or 'precise': i.e. they may provide for the identification of the search area but not for the identification of the search materials - 'we know what area to look for the materials in but not what those materials look like exactly' - or they may provide for the unproblematic identification of search materials - 'we know exactly where to look and what we're looking for'. In providing for the identity of the search area but not for the identity of the search materials, the formulated search category nevertheless provides members with a solution to the current, *here and now* problem of identity in that it allows for the search to be continued by another member of staff (e.g. subject librarian) whose specialist competencies are embedded within the working division of labour.

Having formulated the identity of the search materials, the next step in accomplishing Service Desk search enquiries is to locate and retrieve or provide for the retrieval of the identified search materials. Locating search materials may be achieved in one of two routine ways:

♦ reflexively, in and through the work of formulating the identity of search materials

♦ in and through navigating the catalogue

In the first instance, formulating the identities of search materials through browsing the on-line catalogue reflexively provides for the whereabouts of those materials. In the second instance, members, specifically staff, have to work to 'discover' the whereabouts of identified search materials. Discovering the whereabouts of identified search materials or 'navigating' the catalogue is an achievement:

♦ consisting in the application of formal technical and organizational procedure

♦ consisting in irremediable collaborations between staff and user

The application of formal technical procedure consists in using, often with explicit *instructional* intent in and as of the purposeful details of the current search, the OPAC search modes to discover the identified search materials whereabouts. Employed in

this way, <u>OPAC functions for members as a 'sign-posting' system</u>, pointing the searchers in the direction of the search materials and in so doing may lead the searchers directly to those materials by way of classmark signification or, by the same initial route, lead to the application of formal organizational procedures providing further direction. Formal organizational procedures consist in the application of hard-copy catalogues and forms, the effective employment of which depends upon local organizational knowledge and which in their employment furnish staff with precise directions as to the identified search materials location and with instructions as to how to retrieve those materials. The formal organizational procedures employed in the *management* of catalogue materials provide one reason for saying that navigation is an irremediable collaborative achievement. The second reason is, I think, rather more profound in that navigating cannot be other than an irremediable collaborative achievement regardless of contingent managerial requisites in so much that it is *practically* impossible for any single person to know the catalogue 'inside out'. What members (both staff and user) know is not the catalogue per se, but rather, how to find their way around the catalogue which consists in knowing or knowing how to find out where to go, who to see and / or what to do in order to navigate the catalogue.Thus, in achieving 'real world, real time' navigation staff frequently 'consult' one another as a matter of course.

Staff-to-staff 'consultations' or collaborations are ubiquitous and constituent features of the work constitutive of navigation and filtering and thus of searchings* local production. Staff-to-staff collaborations may be formal, as in formulating solutions to problems of identity or navigation through the embodied orientation to the working division of labour, or, as is more often the case, they may be informal. Informal collaborations in and as of the occasioned achievement of navigation consist in members of staff orientating to and employing each others tacit workaday knowledge of the catalogue in order to navigate the catalogue *here and now*. Informal collaborations in and as of the occasioned achievement of filtering consist in members of staff orientating to each other for assistance, whether on a 'solicited' or 'unsolicted' basis, in eliciting CSD's, formulating search categories, formulating the identity of search areas or search materials and formulating solutions to problems of identity. As in the occasioned achievement of navigation, collaborations in and as of the achievement of filtering consist in an orientation to and the employment of local and contingent organizational knowledge. Informal staff-to-staff collaborations are afforded through the workstation's ecology which in-itself provides or allows for the distribution of organizational knowledge produced by and utilized in the occasioned achievements of filtering and navigation.

Collaborations in and as of the occasioned achievements of filtering and navigation, though particularly the former, are not restricted to members of staff. On the contrary, users collaborate extensively with staff in producing CSD's, search

categories and in the formulation of the identity of search materials. Multi-user search enquiries are distinctive in that users mutually and reciprocally 'work up' search category formulations. Collaborations are an integral feature of searchings* local production in and as of the accomplishment of Service Desk work then, and routinely involve, on any occasion, between three and five members.

In being visibly employed for purposes of eliciting CSD's, of formulating search categories, of formulating the identity of search areas or materials and of providing 'sign-posts' in the situated achievement of navigation, lists and OPAC in particular provide for the orderliness of searching on any occasion. In other words, searching is coordinated in and through users lists and OPAC's methodical employment. These artefacts provide in and as of the details of their use for the *next action* in a search (e.g. for moving from list to browsing, browsing to division of labour, division of labour to further search and / or retrieval instruction), expectedly and warrantably or *sanctionably* so for members. The orderliness of searching is further provided for in and through the implementation of formal technical and organizational procedure and in and through the informal and collaborative practices that underpin their occasioned implementation.

Summary: The Endogenous Details of Searchings* Local Production in and as of the Situated Accomplishment of Service Desk Work - the Ordinary, *Artful* Practice

In the abstract to this report it was said that the concern here was to 'make visible' members 'real world' practices of searching for materials in libraries. The practices constituent of searching in and as of the accomplishment of Service Desk work consist in and as such are reflexively constituted as:

♦ eliciting categorizable search descriptions from users
♦ formulating search categories
♦ formulating the identity of search areas and / or search materials
♦ formulating solutions to problems of identity
♦ locating search materials through navigation
♦ providing for the retrieval of search materials

These are irremediable collaborative practices afforded through the ecology of the workstation and are, furthermore, practices whose in vivo effectiveness depends upon:

♦ staffs local, contingent and tacit organizational knowledge
♦ the methodical employment of lists and the on-line catalogue

In its methodical employment, the on-line catalogue is multi-purpose artefact employed as a tool:

♦ for eliciting categorizable search descriptions
♦ for formulating search categories
♦ for formulating the identity of search area and / or search materials
♦ for providing navigational / locational 'sign-posts'
♦ for coordinating search activities

The next strand of this report will be concerned specifically with users search* practices

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