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FINDERS KEEPERS - SOME NOTES FROM WORK IN PROGRESS ON MATHEMATICAL OBJECTS

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FINDERS KEEPERS

conjectures about different epistemological views of mathematics - preliminary notes

review forms of platonism: Cantor "faithful scribes", Hermite, Hardy "I believe that", Gödel "it seems to me", Thom "indeed"

- contra: Hamilton, Cayley, Bridgeman "the merest truism....", Robinson "I cannot imagine", Rotman " in fact", Davis "a difficult doctrine", Ernest "it is inadequate...."

question: where does all this certainty come from?

Adam Phillips: The psychoanalytic question becomes not, Is that true? but what in your personal history disposes you to believe that? always an interesting question to ask someone in a state of conviction, What kind of person would you be if you no longer believed that?

Cf. notions of "reality" of mental objects in William James "in the distinctively religious sphere of experience, many persons posses the objects of their belief, not in the form of mere conceptions ... but rather in the form of quasi-sensible realities such is the human ontological imagination and such is the convincingness of what it brings to birth".

(what is nice about W James is that he doesn't patronise people with other experience to his own.)

Where else would one find notions of internal and external reality being discussed?

Certainly in the work of the object relations school of psychoanalysis.

Cf. Winnicott: "the good enough mother meets the omnipotence of the infant and to some extent makes sense of it. the infant begins to believe in external reality which appears and behaves as by magic "

"contact of the nipple with the baby's mouth gives the baby ideas!The baby had an idea and the breast with the nipple came and a contact was made ..."

"the baby creates the object, but the object was there waiting to be created and to become a cathected object." (Cathexis, hence verb "cathect": this was coined (from Greek "kathexein" = to occupy) by James Strachey in 1922 to translate Freud's "Besetzung" which referred to physical energy attached to (invested in) an object, thought etc.)

"Some babies have the illusion of finding what was created babies with less fortunate experience are really bothered by the idea of there being no direct contact with external reality."

Cf. Bion's account of the genesis of thought.

Cf. notions of J Klein based on Balint's philobat/ocnophil distinction. She writes of discovery and invention in our love and hate of each other. Discovery is sense as extrapolation - a philobatic (i.e. space-loving) affair. Inventing the object is seen as interpolation - an ocnophilic (i.e. object-loving) matter of filling a blank.

Experience of a realised phantasy makes me feel good and this is almost wholly an experience of "me". If my phantasy is not realised

immediately but soon enough, then I have an experience of a nice not-me.

Is the breast there when I want it?

Sooner or later

Or, for some unfortunates, never

Sfard in her FLM article quotes mathematicians: one of them refers to certainty "that things must be exactly the way they are.like ... an intimate familiarity with a person like a person whom you really know and understand."

Both he and Sfard refer yearningly to real - true - deep - immediate understanding (cf. Walkerdine's snorts about that)

"Reification is the birth of the metaphor of an ontological object."

At another level one might say: Mothering becomes mother.

i.e. there is more to say about reification/encapsulation, etc.

There seems to be an either/or.

But also possibly a "good enough" reconciliation.

Cf. Piaget - who with Beth subtly avoided the crudities of some anti-platonists:

"The object discovered is thus enriched by the discovery"

According to Dummett, the false dichotomy surreptitiously dominates our thinking about the philosophy of mathematics :

"We do not make the objects but must accept them as we find them".

His "objects springing into being in response to our probing" sounds very like Winnicott's baby finding the breast.

Bring into being Ah, those Greeks

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Maintained by Pam Rosenthall <u>email comments and suggestions</u> Last Modified: 11th November 1997