BOUT a century ago science was in A the grip of a surging interest in psychical research. In laboratories, both amateur and professional, literally hundreds of earnest scientists were conducting experiments of the most extraordinary kind-bottling ectoplasm, weighing mediums while in and out of trance, photographing materialised spirit forms, and so on. Though it may seem that such activities were at serious odds with the 19th century mechanistic view of the Universe, on second thought they seem less incongruous. Most of these pioneers were raised and educated within the ethos of Victorian Christianity which held that man was essentially an immortal spirit for whom death was a transition and not an extinction point. Furthermore, they were also steeped in the notion of the infallibility of the 19th century scientific method—everything in the Universe was fit and ready for instant laboratory investigation. Thus the weird phenomena of psychic research were no more elusive in principle than the behaviour of molecules or planets.

The rollcall of personalities involved in that phase of psychical research is breathtaking and includes Lodge, Rayleigh, Freud, Wallace, Richet, Crookes, Gladstone and J. J. Thomson, to name but a few; all came to believe that psychic research was one of the most important avenues of study for mankind, and incurred the contemptuous scorn of fellow academics as a result. Sir William Crookes for example, one of the most distinguished physicists of the century, participated actively in spiritualist seances and was so confident of his beliefs that he proudly allowed himself to be photographed arm-in-arm with a "materialised spirit form", a diaphanously garbed but otherwise rather earthy-looking being, known as Katie King.

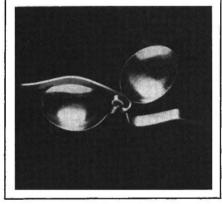
Well, a 100 years have rolled by and, in spite of the sonorous declarations of Crookes and his contemporaries and the volumes of scientific papers on psychical research, who today—apart from a few ardent spiritualists—treats bottled ectoplasm or the photographs of the Crookes-Katie King encounter as anything other than fading curiosities? Worse still, who would argue that all the industry of those gallant pioneers and the stupendous cerebral effort they invested in chasing phantoms has improved our understanding of the Universe one jot?

I have to admit that disheartening reflections of this kind drifted through my head as I scanned through John Taylor's *Superminds**. The author is a

*Superminds: An Enquiry into the Paranormal. By John Taylor. Pp. 183. (Macmillan: London and Basingstoke, April 1975.) £3.95. distinguished mathematician and physicist with an international reputation in his field. He is also at this time actively preoccupied with investigating phenomena which, if not actually involving ectoplasm and spirits appearing out of floors, will seem to most scientists to be more or less in the same category. The phenomena in question involve mysterious distortions in objects such as spoons, forks and metal bars, which are alleged to take place in the general vicinity of certain children. I say "in the general vicinity of" and yet, though most of the bendings and distortions -some of them are literally grotesque, as the book's numerous illustrations reveal-require the child to stroke or

Brave but not convincing

Christopher Evans



otherwise handle the metal, others allegedly take place at distances varying from yards to miles away from the 'bender'. As if that were not enough, the objects sometimes bend inside metal boxes, corked test tubes and even in locked cupboards.

Professor Taylor's interest in this peculiar pocket of the Universe seems to have been sparked by the notorious BBC television programme in which the flamboyant Uri Geller disintegrated a fork before an historically uncritical audience. This was followed by more closely controlled demonstrations in Taylor's laboratory at King's College, some of which unsettled him to the extent that, as he puts it, "the whole framework with which I viewed the world had suddenly been destroyed". From here there seemed no course but to continue the investigations through to the end, whether bitter or glorious, taking as subjects some of the children whose metal bending powers sprang into being following the television demonstration.

As a result Taylor is convinced that he is tapping and probing previously unknown forces of immense potential and significance, and his *Superminds* is in part a record of his findings and in part an attempt at providing a theoretical framework for them. For the latter he leans on hypotheses invoking electromagnetism, mainly because no other kind of theory even remotely begins to fit the facts. The soundness of this theorising is a matter for discussion by other theoretical physicists but I must raise the strong suspicion that Professor Taylor is putting the cart before the horse. Before getting drawn into the complexities of theorising it is more economic to make absolutely certain that one has not only established the phenomena beyond all doubt, but that one has also satisfied oneself that these phenomena cannot be encompassed within any existing theory.

Unfortunately, though Taylor may well be convinced of this in his own mind, the material in the book will, I fear, do little to convince other scientists. My most serious objection is the ease with which he seems able to discount the possibility of fraud and deception; true, he has devised some elaborate apparatus—attaching the objects to spring balances to detect whether the benders are using physical pressure on them, and so on-but these precautions seem to me to be diversionary and indirect when more positive strategies could be used.

For example, if it is claimed that an individual can bend metal, within containers of various kinds, without touching it, then the first step should be to set up apparatus in an independent laboratory, using infrared beams to detect prying fingers, and videotape to record the metal as it distorts. Alternatively, if it is argued that laboratory conditions are inhibiting-Taylor comments, rather ingenuously, that the presence of "sceptics" tends to kill the phenomena-then all one has to do is to encapsulate metal bars in specially blown glass spheres which can be left for a given period in the homes of the 'superminds', and which can be inspected afterwards for signs of tampering. In fact, since writing Superminds Taylor has been attempting automation of his experiments, including constant videotaping, in an attempt to meet objections of this kind. The truth of the matter is, however, that if half of what is claimed on behalf of the superminds is true, then scientists and science in general deserve more solid data than he offers in this particular work. But it is still a brave book and Professor Taylor is a brave man to have written it. Alas it is the same kind of bravery, in my view, that Crookes exhibited when he took an alluring ghost by the arm and tried to convince the world of her reality. Crookes' contemporaries remained unconvinced, and so, I suspect, will Taylor's.