

21 September, 1979

"Supersition" [is] cowardice in the presence of the Divine." So said Theophrastus, a contemporary of Aristotle and Alexander. We live in a universe where atoms are made in the stars; where life is sparked by sunlight and lightning in the airs and waters of youthful planets; where the raw material for biological evolution is sometimes made by the explosion of a star halfway across the Galaxy; where matter can be put together in so subtle a way as to become self-aware; where a thing as beautiful as a galaxy is formed a hundred billion times; a universe of quasars and quarks, snowflakes and fireflies; where there may be black holes and other universes and intelligent beings so far beyond us that their technology will seem to us indistinguishable from magic. How pallid by comparison are the pretensions of superstition and pseudoscience; how important it is for us to pursue and understand science, that characteristically human endeavor -- imperfect and incomplete surely. But the best means to understand the world that we know. There is no aspect of nature which fails to reveal a deep mystery, to touch our sense of awe and wonder. Theophrastus was right. Those afraid of the universe as it really is, those who wish to pretend to non-existent knowledge

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and control and a Cosmos centered on human beings, will prefer superstition.

But those with the courage to explore the weave and structure of the Cosmos,

even where it differs profoundly from our wishes and prejudices, to those

people belongs the future. Superstitions may be comforting for a while. But,

because they avoid rather than confront the world, they are doomed. The future

belongs to those able to learn, to change, to accomodate to this exquisite

Cosmos that we have been privileged to inhabit for a brief moment.