

tional "poorhouse" importing energy when, like Abou Ben Adhem, we have infinite riches buried in our own back yard.

WILLIAM B. ELMER
Andover, Massachusetts

A science for everyone

Astronomy includes a very wide range of knowledge, and a properly prepared student must have some background in virtually every natural science. This background has led to a considerable drift of astronomers into related fields. Of course, astronomy's breadth also makes it possible for people without a general background to specialize in given areas of astronomical research and to do quite well as it.

While few earn a livelihood from astronomy, it is now and always has been a science for everyone. Virtually every human being with the gift of sight has at one time or another contemplated the stars and wondered at their significance. Thus it is no surprise that cosmological theory has always been heavily influenced by the millions of clever individuals who are not astronomers. Nor is it a surprise that, in the midst of a revolution in detector technology, many outside contributions are in the field of observational astronomy.

Martin Harwit's article "Physicists and Astronomy..." (November, page 172) will help to attract additional good minds to a most interesting range of subjects, but I hope the doesn't mind if I decline his invitation to dance. Welcome aboard Martin, there is science enough for everyone.

GEORGE D. GATEWOOD
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12/81

Reform letter writers

I recommend that we reform out letter-writing habits in PHYSICS TODAY. Our letters, particularly regarding social issues, have taken on a standard format:

It's amazing that Greedy, Neanderthal Dr A fails to agree with Beneficent, Enlightened Dr B, particularly when it is obvious to anyone that tennis balls cause coat hanger.

Our letters have degenerated into a rhetorical goulash, and it is very hard to swim in goulash.

From my perspective, every human endeavor can be interpreted to have both a profound, humane purpose and a sleazy, ulterior motive. Although it is entertaining to point out the sleazy side of others, it is generally unproductive.

Seldom have I had my own thinking contributed to by someone explaining to me how bad I am, nor have I ever changed people's minds while calling them jerks (no matter how elegantly I phrased it).

Every scientist has chosen science because of a *fundamental commitment to contribute to people*. When we acknowledge this, we can get to work. In a climate where people know they are aligned toward some *mutual purpose*, each perspective is a necessary and supplementary component rather than an obstacle. Within a community which vocally and consistently expresses its shared vision, there is more chance of that vision being realized.

While we're at it, let's stop being defensive about people in other fields. I've talked with hundreds of people about the purpose of their work. When you get to the bottom line (which isn't easy, as we rarely examine our purposes), the bottom line is always the same: "I do what I do because I think it's how I can contribute to the quality of life." I've heard this from anthropologists, theologians, plumbers, programmers, Latinists, business people and physicists.

As for the tennis balls and coat-hangers, let's raise the level of examples we use, and cite sources. The December letters contained some fascinating statements about power-plant safety and economics that I have no idea how to verify. It is our job as scientists to communicate findings in a way others can work with. Authors' names should include their complete mailing address so they can receive the response they elicit by writing publicly.

What we have to contribute is our data, our ideas, our insights and our vision. Let's use PHYSICS TODAY for these things, and have it be a forum that produces solutions rather than a battlefield for undermining reputations.

JOHN COONROD
Princeton Plasma Physics Laboratory
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1/81

Male world of physics?

I would hope that if Karl Darrow were addressing the APS today, he would recognize that not all physicists are male. After seven paragraphs of instructions to male speakers to a male audience, he finally introduces a female pronoun: "It may be instructive to see a dancer fall on her face, pick herself up, and resume her part in the ballet, but for practically everyone else it is acutely embarrassing." In the male world of physics of Darrow, presumably only females fall on their faces. And even the editorial comment accompanying the article calls his instructions

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