I have recently accepted Howard Sloane's resignation as Treasurer of the Coblentz Society in order that he might devote greater efforts to his business ventures. Anyone who has been associated with the Coblentz Society over the past decade or more knows how greatly his services will be missed. Not only was he a first class treasurer, he was a large part of the "corporate memory." Fortunately, Howard promises to remain a very active member of the Coblentz Society and we will continue to benefit by his wisdom, fine humor, and common sense.

Until the Board elects a new Treasurer, Bob Obrenski (Beckman) has agreed to handle the treasurers' responsibilities at my request.

The Board will support a mixer at the "Pittsburgh Conference" from 5 to 6:30 p.m. on March 8. Members and potential members will be able to determine the location by visiting the Coblentz booth. Also, a general introduction of the Board will be made at 5:30 p.m. on March 8 and we hope the members will take this opportunity to meet the Board and communicate areas where they believe the Coblentz Society should be focusing its resources. In particular, we invite members to discuss specific spectroscopic problems and encourage you to bring your data, if appropriate.

WILLIAM C. HARRIS

SOME ACTIVITIES OF THE COBLENTZ SOCIETY

The Spectral Evaluation Committee generates standards for obtaining, storing, and reporting infrared spectral information and may consider soon the special implications in this area of extensive computer data processing. The Archives Committee is charged with collecting historical information on spectroscopy.

Our spectral publications program generates evaluated spectral collections which have seen enthusiastic public acceptance, and support many activities of the society.

Short courses, awards, special meetings, student activities, audio courses, and speakers' bureau, are some of the numerous ongoing activities of the Society, with several new activities being planned.

SPECTROSCOPIC FORECASTS

MICROSCOPIC SPECTROSCOPY: A DIFFERENT MEANING OF THE WORD

T. Hirschfeld

Everybody knows what is meant by microspectroscopy: the measurement of very small samples. But the
same word could as well be applied to measurements using a very small spectrometer. And there is more to this than a mere complaint about the imprecision of language.

What would be the significance of a very small, portable, infrared spectrometer? Say, for the sake of argument, that it becomes possible to build such a spectrometer the way the first pocket scientific calculator was built. According to folklore, Bill Hewlett of Hewlett Packard called his engineers together, showed them his shirt pocket, and told them “build a scientific calculator to fit here.” This became the famous HP-35, granddaddy of tens of millions of pocket scientific calculators.

Technologically, this is not at all farfetched. High technology blackbody sources, microdetectors, FT-IR using the counter Jacquinot advantage, tunable filters, and eventually tunable lasers, plus the underlying magic of microelectronics, have brought such a device within view if not quite within reach.

Clearly, such a device would probably not start out as a high precision quantitative tool, but the traditional qualitative field of infrared spectroscopy is far more tolerant. But what would be the significance of doing this?

Maybe we should think back to our calculator analogy, and remember the dramatic market expansion that followed when the individual user was given portable calculating power. In a few short years, the slide rule became extinct, as did the previous generation of desktop calculators, and every scientist and engineer, as well as many related people, now have calculators somewhere on them.

Can such a revolution overtake infrared spectroscopy? If infrared qualitative analysis can be moved forward out of the laboratory into the workplace, near real time answers on compositional questions will become available. This in turn will create a new type of demand for such data. This may have little if any overlap with the kind of questions now referred back to the analytical lab. Questions of material identification or verification, spot checks without the administrative lag time of going back to the lab; field operations, in situ measurements, etc., will all become prominent.

Of course, this concept can become practical only in the near absence of sample preparation, requiring such sampling methods as diffuse reflectance, thin films, or even high pressure clamp cells. Easy sampling and insensitivity to contamination may well favor near infrared technology. Interpretation will need to work on either a small set of possibilities, or be based on phone lines back to a lab computer. The essential need for low cost could be readily met by mere economy of scale in production.

Such a near science fictional scenario will materialize much earlier than most readers would be willing to believe. By preparing for this revolution, and helping lay down the groundwork for it, we have the opportunity of being its beneficiaries rather than its victims.

BOOK REVIEW
Infrared Spectra of Plasticizers and of Other Additives, 2nd Ed. $75.

A large collection of the most widely used plasticizers plus key inorganic additives and fire retardants. The most useful set of 310 spectra that the industrial analytical laboratory can buy. These spectra have more than qualitative value. Many of them have been determined in solution at calibrated thickness—with multiple thicknesses to bring out key weak bands or to make the absorbance value of strong bands readable. Instrument operating parameters are chosen to permit valid band intensity use for semiquantitative or order-of-magnitude analysis. Find out why experts claim that solution spectra give you definitive answers and save time in the long run!

Comprehensive indexes include common and trade names, and chemical names as well as molecular formulæ.

CONGRATULATIONS TO OUR AWARD WINNERS
The recipients of the two awards to be given by the Coblentz Society at the 1983 Pittsburgh Conference have been announced:
Coblentz Award: David Cameron
Williams-Wright Award: Harry A. Willis
Our congratulations to both awardees.

DO WE HAVE YOUR CORRECT ADDRESS?
You may not have been receiving a mailed copy of the Coblentz Newsletter, and if you have recently (or not so recently) changed your address, you may have to do something about it. After all, we can only learn of your change of address when you renew your membership (at maybe multiyear intervals) or when you let us know. I'm getting quite a few mailings back from the Post Office. So let us know when you move, please? Pretty please??