

# Newsletter

The International Lecithin and Phospholipid Society

November, 2001

Randy Zigmont, Editor

## AOCS Phospholipid Division Best Paper Award

Armin Wendel, Managing Director of Nattermann Phospholipid GmbH was presented with the Best Paper Award at this year's Phospholipid Division Meeting at the AOCS Annual Meeting in Minneapolis. The award was in recognition of his two-part article entitled, "Lecithin: The First 150 Years". Subsequently, a third article entitled, "Lecithin in Chocolates, The Historical Start", was published in August, 2001, edition of Inform magazine. Mr. Wendel is currently in the process of completing a book on lecithin/phospholipid industries and applications with a title that is yet to be defined. ❖

## The New "Essential Vitamin

Central Soya was successful in petitioning the FDA for new label claims for choline. Central Soya's continuous support in promoting choline as the new "essential" vitamin can be substantiated by the following claims allowed by the FDA:

To qualify for the "good source of choline" label claim, a food or supplement must contain 55 milligrams per serving and 110 mg per serving to make the "excellent source of choline" claim.

These levels are 10% and 20%, respectively, of the Adequate Intake for choline as established by the National Academy of Sciences' Food and Nutrition Board, which also recognized choline as an essential nutrient. ❖

## ILPS Website

The ILPS would like to make you aware of our web site at [www.ilps.org](http://www.ilps.org). Visit it for continuous updates, industry relations, and upcoming events. ❖

## Certified Reference Standards

The new ILPS Crude Lecithin standard material has been assayed for composition by Avanti Polar Lipids, Analytical Services Division using validated high performance liquid chromatography with evaporative light scattering detection (HPLC / ELSD) and <sup>31</sup>P nuclear magnetic resonance (NMR) methods. Measurement was derived from standards formulated from individual soy phospholipids of known purity and concentration. HPLC / ELSD method calibration was performed using a five point curve to compensate for the previously reported non-linear concentration response of the evaporative light scattering detector. Individual phospholipid calibration curves encompassed the concentration range for each component of the ILPS Crude Lecithin standard matrix. This method was presented at the 91<sup>st</sup> AOCS Annual Meeting & Expo in San Diego, CA. Table 1 reports the assay of 4 sample preparations assayed in triplicate. A representative chromatogram is provided in figure 1.

Analysis of the ILPS Crude Lecithin Standard was performed by <sup>31</sup>P NMR by dissolving the sample into a buffered detergent system of deoxycholic acid / EDTA. The measurement was performed on a 600 MHz instrument after addition of trimethylphosphate as internal reference and D<sub>2</sub>O to achieve uniform peaks through proton decoupling. Demonstrated linearity of response for each phospholipid throughout their respective concentration range allows for single point calibration of the method. The same calibration material described for the HPLC/ELSD method was utilized in the analysis of the ILPS Crude Lecithin Standard by <sup>31</sup>P NMR. Table 2 reports the assay of triplicate sample preparations. A representative FID is provided in figure 2.

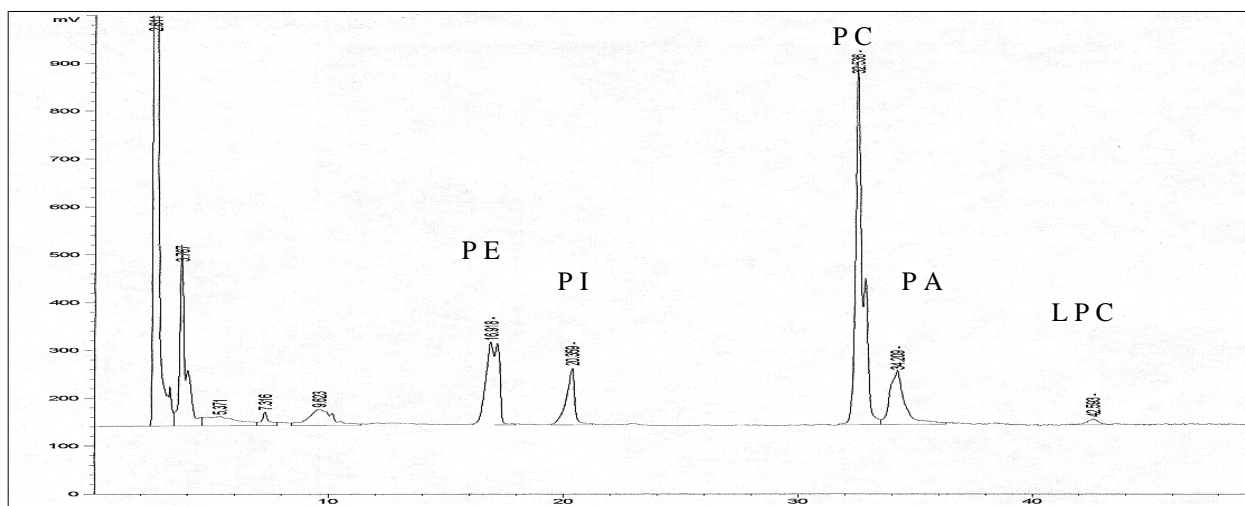
Avanti Polar Lipids, Inc. Fax 800-229-1004 (USA & Canada) Fax 205/663-0756 (INT)  
[Info@avantilipids.com](mailto:Info@avantilipids.com). Visit our web site  
[www.avantilipids.com](http://www.avantilipids.com) For more information contact our product hotline 800/227-0651 (US & Canada) or 205/663-2494 (INT) ❖

**Table 1:**

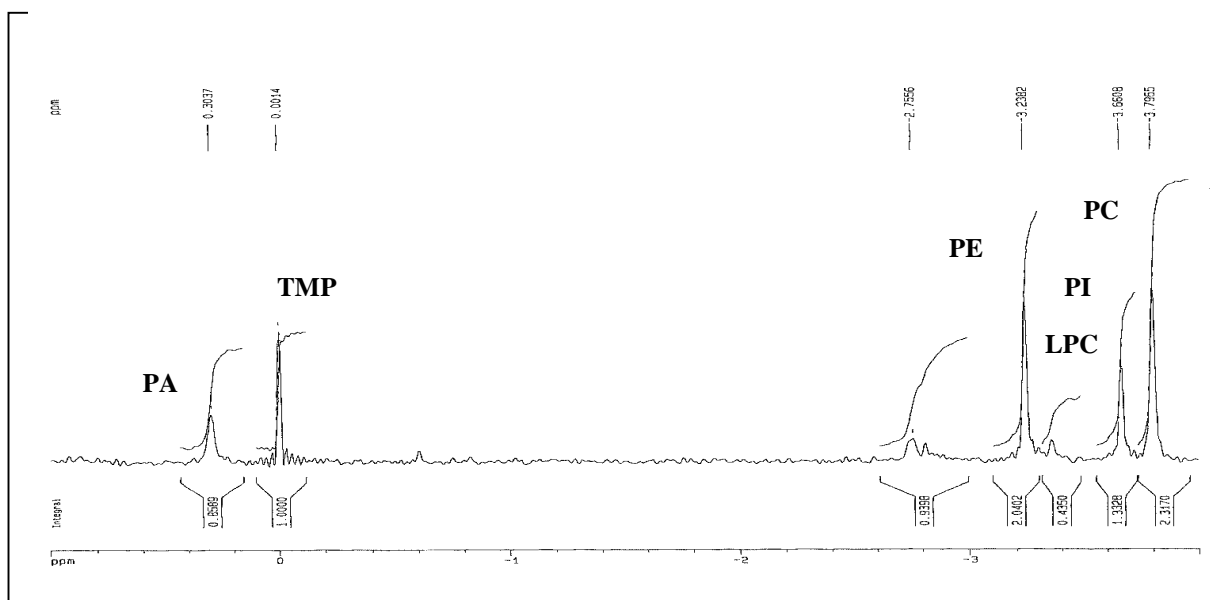
HPLC / ELSD						
ILPS Crude Lecithin Standard	PE (%)	PI (%)	PC (%)	PA (%)	LPC (%)	Total (%)
Mean (n= 12)	10.6	8.9	13.8	6.0	0.6	39.8

**Table 2:**

<sup>31</sup> P NMR						
ILPS Crude Lecithin Standard	PE (%)	PI (%)	PC (%)	PA (%)	LPC (%)	Total (%)
Mean (n= 3)	10.4	8.3	14.0	5.9	0.5	39.1



**Figure 1:** HPLC / ELSD Chromatogram; Phosphatidylethanolamine (PE), Phosphatidylinositol (PI), Phosphatidylcholine (PC), Phosphatidic acid (PA)



**Figure 2:** <sup>31</sup>P NMR FID; Phosphatidic acid (PA), Trimethylphosphate, internal reference (TMP), Phosphatidylethanolamine (PE), Lyso Phosphatidylcholine (LPC), Phosphatidylinositol (PI) and Phosphatidylcholine (PC).

## 8<sup>th</sup> International Congress on Phospholipids

The ILPS will host the 8<sup>th</sup> International Congress on Phospholipids at on September 7 - 9, 2002, at The University of Vienna, Vienna, Austria.

The Congress will include the following sessions:

September 8<sup>th</sup> – *Phospholipid Metabolism and Brain Function*

*Chairpersons: Dr. Robert Schlegel, Dr. Giancarlo Pepeu*

September 9<sup>th</sup> – *Choline and Glycosphingolipids in Health and Disease*

*Chairperson: Dr. Alfred H. Merrill, Jr.*

*Phospholipids in Cardiovascular, Liver and Muscle Health*

*Chairpersons: Dr. Gregory Paul, Dr. Mier Shinitzki*

September 10<sup>th</sup> – *Phospholipids in Infant Nutrition*

*Chairperson: Dr. K. Widhalm*

This Congress is organized in cooperation with the University of Vienna. For more information, see the ILPS website or contact the local organizer Mondial, e-mail: [congress@mondial.at](mailto:congress@mondial.at). Mailings of the first Congress announcement has been made and a press release is sent to leading scientific journals. ILPS members are invited to distribute announcements to potential interested people and to promote active participation. The goal is to have an expert Congress with 100 participants. A second announcement with the extensive program and traveling details will be available early Spring, 2002.❖

For further information regarding the ILPS or its membership, please contact the following officers:

William van Nieuwenhuyzen, Pres. at 32 2 257 0628  
Susan Gurkin, Vice President, at 770/986-6268  
Lance Colbert, Treasurer, at 217/424-5802 ❖

## European Analytical Subgroup Meeting

Tentative meeting scheduled for 3/27/02 at Degussa, Hamburg.❖

## Election of ILPS Officers

New officers were elected at the last AOCS Annual Meeting at Minneapolis. The officers are as follows:

President - Willem van Nieuwenhuyzen, Central Soya, [wvanieuwenhuyzen@be.cereolworld.com](mailto:wvanieuwenhuyzen@be.cereolworld.com)

Vice President - Susan Gurkin, Degussa, Texturant Systems, [susan.gurkin@degussa.com](mailto:susan.gurkin@degussa.com)

Secretary - Bruce Sebree, Archer Daniels Midland, [sebree@admworld.com](mailto:sebree@admworld.com)

Treasurer - Lance Colbert, Archer Daniels Midland, [colbert@admworld.com](mailto:colbert@admworld.com)

Analytical Secretary, - Justin Meins, Riceland Foods, Inc., [jmeins@riceland.com](mailto:jmeins@riceland.com)

Past President - Randall E. Zigmont, American Lecithin Company, [rzigmont@aol.com](mailto:rzigmont@aol.com)

Program Chair - Bernard Szuhaj, Central Soya Company, [bszuhaj@us.cereolworld.com](mailto:bszuhaj@us.cereolworld.com)

Member at Large - Walter Shaw, Avanti Polar Lipids, [waltshaw@avantilipids.com](mailto:waltshaw@avantilipids.com) ❖

## IFT 2002 Annual Meeting Food Chemistry Division

The Food Chemistry Division of the IFT will host their symposia at the Annual IFT Meeting and Expo on June 15-19, 2002, at Anaheim, California. The technical program is listed below:

*Enzyme Uses in the Food Industry 2002*

*Dairy Enzymes*

*Food Starch Enzymes*

*Enzymes for Sugar Processing*

*Lipases for Food Ingredients*

*Protein Modifying Enzymes*

*Flavor Enzymes*

ILPS participation includes the area of Enzyme Modified Lecithins.

ILPS officers Bernie Szuhaj and Willem van Nieuwenhuyzen are session chairs and currently inviting speakers.❖

ILPS  
C/o American Lecithin Co.  
115 Hurley Road, Unit 2B  
Oxford, CT 06478



ADDRESS CORRECTION REQUESTED