

# ORGANIZING COMMITTEE

Harold A. Harvey  
Allan Lipton  
Richard J. Santen

## PROGRAM

List of Speakers ..... 3267s

Introduction to the Conference, *Aromatase: New Perspectives for Breast Cancer.*  
*Richard J. Santen* ..... 3268s

Review of Studies on Estrogen Biosynthesis in the Human.  
*Pentti K. Siiteri* ..... 3269s

### Physiology, Biochemistry, and Biological Significance

*Chairpersons:* Pentti K. Siiteri  
Richard J. Santen

Aromatase in the Central Nervous System.  
*F. Naftolin and Neil J. MacLusky* ..... 3274s

Biochemical Mechanism of Aromatization.  
*Jack Fishman* ..... 3277s

Discussion ..... 3279s

### Epidemiological Considerations: Aromatase, Obesity, and Breast Carcinoma

*Chairpersons:* Marvin A. Kirschner  
Kenneth J. Ryan

Obesity, Androgens, Estrogens, and Cancer Risk.  
*M. A. Kirschner, G. Schneider, N.H. Ertel, and E. Worton* ..... 3281s

Cyclic Ovarian Function and Breast Cancer.  
*Barry M. Sherman, Robert B. Wallace, and Judy A. Bean* ..... 3286s

Relationship of Obesity to Blood Estrogens.  
*Barnett Zumoff* ..... 3289s

Discussion ..... 3292s

### In Vitro and in Vivo Assay Methodology and Biochemistry

*Chairpersons:* Pentti K. Siiteri  
Kenneth J. Ryan

*In Vitro* Assays of Aromatase and Their Role in Studies of Estrogen Formation in Target Tissues.  
*Judith Weisz* ..... 3295s

Multiple Forms of Aromatase and Response of Breast Cancer Aromatase to Anti-placental Aromatase II Antibodies.  
*Yoshio Osawa, Buichi Tochigi, Tadayoshi Higashiyama, Carol Yarborough, Tohoru Nakamura, and Takara Yamamoto* ..... 3299s

Discussion ..... 3305s

## Pharmacological Inhibitors of Aromatase: Biochemical Studies

Chairpersons: Harry Brodie  
Pentti K. Siiteri

Methods and Results of Aromatization Studies <i>in Vivo</i> . <i>Christopher Longcope</i> .....	3307s
Overview of Recent Development of Aromatase Inhibitors. <i>Angela M. H. Brodie</i> .....	3312s
Basic Studies on Aminoglutethimide. <i>Hilton A. Salhanick</i> .....	3315s
Design of Mechanism-based Inactivators of Human Placental Aromatase. <i>Patrick A. Marcotte and Cecil H. Robinson</i> .....	3322s
A New Hypothesis Based on Suicide Substrate Inhibitor Studies for the Mechanism of Action of Aromatase. <i>Douglas F. Covey and William F. Hood</i> .....	3327s
Discussion .....	3332s
Substituted C <sub>19</sub> Steroid Analogs as Inhibitors of Aromatase. <i>Robert W. Brueggemeier, Catherine E. Snider, and Raymond E. Counsell</i> .....	3334s
Estrogen Synthesis in Human Breast Tumor and Its Inhibition by Testololactone and Bromoandrostenedione. <i>Thomas L. Dao</i> .....	3338s
Biochemistry of Aromatase: Significance to Female Reproductive Physiology. <i>Kenneth J. Ryan</i> .....	3342s

## Pharmacological Inhibitors of Aromatase: *In Vivo* Studies

Chairpersons: Christopher Longcope  
Richard J. Santen

<i>In Vivo</i> Effects of $\Delta^1$ -Testololactone on Peripheral Aromatization. <i>Howard L. Judd, Robert M. Barone, Larry R. Laufer, Joseph C. Gambone, Steven L. Monfort, and Bill L. Lasley</i> .....	3345s
Steroid Hormone Profiles in Women Treated with Aminoglutethimide for Metastatic Carcinoma of the Breast. <i>E. Samojlik, R. J. Santen, M. A. Kirschner, and N. H. Ertel</i> .....	3349s
<i>In Vivo</i> and <i>in Vitro</i> Pharmacological Studies of Aminoglutethimide as an Aromatase Inhibitor. <i>R. J. Santen, S. J. Santner, N. Tilsen-Mallett, H. R. Rosen, E. Samojlik, and J. D. Veldhuis</i> .....	3353s
Discussion .....	3357s

## Aromatase Inhibitors as Treatment of Animal Breast Carcinoma Models

Chairperson: Richard J. Santen

Effects of Aromatase Inhibitor 4-Hydroxyandrostenedione and Other Compounds in the 7,12-Dimethylbenz(a)anthracene-induced Breast Carcinoma Model. <i>Angela M. H. Brodie, Wesley M. Garrett, James R. Hendrickson, and Chon-Hwa Tsai-Morris</i> .....	3360s
Discussion .....	3363s

## Aromatase in Human Breast Carcinoma—Biochemistry: *In Vitro* Inhibitors

Chairpersons: Angela M. H. Brodie  
William R. Miller

Significance of Aromatase Activity in Human Breast Cancer. <i>W. R. Miller, R. A. Hawkins, and A. P. M. Forrest</i> .....	3365s
Aromatase in Human Breast Carcinoma. <i>E. Perel, M. E. Blackstein, and D. W. Killinger</i> .....	3369s
Comparative Studies of Aromatase Inhibitors in Relation to the Significance of Estrogen Synthesis in Human Mammary Tumors. <i>Yusuf J. Abul-Hajj</i> .....	3373s
Comparative Studies of Aromatase Inhibitors in Cultured Human Breast Cancer Cells. <i>J. H. MacIndoe, G. R. Woods, L. A. Etre, and D. F. Covey</i> .....	3378s
A Reassessment of the Role of Breast Tumor Aromatization. <i>H. Leon Bradlow</i> .....	3382s
Discussion .....	3385s

## Aromatase Inhibitors as Treatment of Human Breast Carcinoma

Chairpersons: Allan Lipton  
Trevor J. Powles

$\Delta^1$ -Testololactone: Clinical Trials. <i>Albert Segaloff</i> .....	3387s
Treatment of Advanced Breast Cancer with Aminoglutethimide: A 14-Year Experience. <i>Kenneth E. Gale</i> .....	3389s
Adequacy of Estrogen Suppression with Aminoglutethimide and Hydrocortisone as Treatment of Human Breast Cancer: Correlation of Hormonal Data with Clinical Responses. <i>Richard J. Santen, Thomas J. Worgul, Eugeniusz Samojlik, Alice E. Boucher, Allan Lipton, and Harold Harvey</i> .....	3397s
Aminoglutethimide in the Treatment of Metastatic Breast Cancer. <i>Michael B. Troner</i> .....	3402s
Aminoglutethimide in the Treatment of Advanced Postmenopausal Breast Cancer. <i>Adrian L. Harris, Trevor J. Powles, and Ian E. Smith</i> .....	3405s
Tamoxifen and Aminoglutethimide in Advanced Breast Cancer. <i>Joseph Corkery, Robert C. F. Leonard, I. Craig Henderson, Rebecca S. Gelman, Joseph Hourihan, Diane M. Ascoli, and Hilton A. Salhanik</i> .....	3409s
Adjuvant Aminoglutethimide Therapy for Postmenopausal Patients with Primary Breast Cancer: Progress Report. <i>R. Charles Coombes, Clair Chilvers, Mitch Dowsett, Jean-Claude Gazet, Hubert T. Ford, Radka Bettelheim, Caroline Gordon, Ian E. Smith, David Zava, Trevor J. Powles, and Investigators of the Collaborative Breast Cancer Project</i> .....	3415s
Discussion .....	3418s

## Antiestrogens as Alternative Means of Inhibiting Estrogen Action

Chairpersons: Allan Lipton  
William L. McGuire

New Strategies for Investigating Antiestrogen Action in Breast Cancer. <i>William Leo McGuire</i> .....	3420s
Discussion .....	3422s
Antiestrogen Treatment of Breast Cancer: An Overview. <i>Olof H. Pearson, Andrea Manni, and Baha'uddin M. Arafah</i> .....	3424s
Discussion .....	3428s

## Randomized Trials of Aromatase Inhibitors versus Antiestrogens

Chairpersons: William L. McGuire  
Harold A. Harvey

Tamoxifen versus Aminoglutethimide versus Combined Tamoxifen and Aminoglutethimide in the Treatment of Advanced Breast Carcinoma. <i>Ian E. Smith, Adrian L. Harris, Michael Morgan, Jean-Claude Gazet, and J. Alan McKinna</i> .....	3430s
Discussion .....	3433s
Randomized Trial of Aminoglutethimide versus Tamoxifen in Metastatic Breast Cancer. <i>Allan Lipton, Harold A. Harvey, Richard J. Santen, Alice Boucher, Deborah White, Albert Bernath, Richard Dixon, George Richards, and Ahmed Shafik</i> .....	3434s
Aminoglutethimide in Tamoxifen-resistant Patients: The Melbourne Experience. <i>Robin M. L. Murray and Paula Pitt</i> .....	3437s
Discussion .....	3439s
Phase II Study of Aminoglutethimide and Medroxyprogesterone Acetate in the Treatment of Patients with Advanced Breast Cancer. <i>Gerd A. Nagel, Hans-Erik Wander, and Hans-Christian Blossey</i> .....	3442s
Discussion .....	3444s

## Aminoglutethimide in Tamoxifen-resistant Patients

Chairpersons: Harold A. Harvey  
William L. McGuire

- Use of Aminoglutethimide as Second-Line Endocrine Therapy in Metastatic Breast Cancer.  
*Stanley B. Kaye, Robert L. Woods, Richard M. Fox, Alan S. Coates, and Martin H. N. Tattersall* ..... 3445s
- Aminoglutethimide after Tamoxifen Therapy in Advanced Breast Cancer: M. D. Anderson Hospital Experience.  
*Aman U. Buzdar, Kimberly C. Powell, and George R. Blumenschein* ..... 3448s

## Aromatase Inhibition versus Surgical Ablation

Chairpersons: Harold A. Harvey  
William L. McGuire

- Cross-Over Comparison of Tamoxifen and Aminoglutethimide in Advanced Breast Cancer.  
*Harold A. Harvey, Allan Lipton, Deborah S. White, Richard J. Santen, Alice E. Boucher, Ahmed S. Shafik, Richard J. Dixon, and Members of The Central Pennsylvania Oncology Group* ..... 3451s
- Comparison of Surgical Adrenalectomy to Medical Adrenalectomy in Patients with Metastatic Carcinoma of the Breast.  
*Samuel A. Wells, Jr., Thomas J. Worgul, Eugeniusz Samojlik, Alice E. Boucher, Allan Lipton, Harold Harvey, Deborah White, Emma Smart, Charles Cox, and Richard J. Santen* ..... 3454s

## Combinations of Agents to Inhibit Estrogenic Actions as Treatment of Breast Carcinoma

Chairpersons: William L. McGuire  
Harold A. Harvey

- Clinical Trial of Multiple Endocrine Therapy for Metastatic and Locally Advanced Breast Cancer with Tamoxifen-Aminoglutethimide-Danazol Compared to Tamoxifen Used Alone.  
*Trevor J. Powles, C. Gordon, and R. C. Coombes* ..... 3458s
- Progress Report on Two Clinical Trials in Women with Advanced Breast Cancer. Trial I: Tamoxifen versus Tamoxifen plus Aminoglutethimide; Trial II: Aminoglutethimide in Patients with Prior Tamoxifen Exposure.  
*James N. Ingle, Stephanie J. Green, David L. Ahmann, John H. Edmonson, William C. Nichols, Stephen Frytak, and Joseph Rubin* ..... 3461s
- Discussion ..... 3464s
- Closing Remarks to the Conference, *Aromatase: New Perspectives for Breast Cancer*.  
*Allan Lipton, Harold A. Harvey, and Richard J. Santen* ..... 3468s

# Cancer Research

The Journal of Cancer Research (1916–1930) | The American Journal of Cancer (1931–1940)

## 42 (8 Supplement)

*Cancer Res* 1982;42:3334s-3450s.

**Updated version** Access the most recent version of this article at:  
[http://cancerres.aacrjournals.org/content/42/8\\_Supplement.citation](http://cancerres.aacrjournals.org/content/42/8_Supplement.citation)

**E-mail alerts** [Sign up to receive free email-alerts](#) related to this article or journal.

**Reprints and Subscriptions** To order reprints of this article or to subscribe to the journal, contact the AACR Publications Department at [pubs@aacr.org](mailto:pubs@aacr.org).

**Permissions** To request permission to re-use all or part of this article, use this link [http://cancerres.aacrjournals.org/content/42/8\\_Supplement.citation](http://cancerres.aacrjournals.org/content/42/8_Supplement.citation). Click on "Request Permissions" which will take you to the Copyright Clearance Center's (CCC) Rightslink site.