

This manual is for reference and historical purposes, all rights reserved.

This page is copyright© by M. Butkus, NJ.

This page may not be sold or distributed without the expressed permission of the producer

I have no connection with any camera company

On-line camera manual library

This is the full text and images from the manual. This may take 3 full minutes for the PDF file to download.

If you find this manual useful, how about a donation of \$3 to: M. Butkus, 29 Lake Ave., High Bridge, NJ 08829-1701 and send your e-mail address so I can thank you. Most other places would charge you \$7.50 for a electronic copy or \$18.00 for a hard to read Xerox copy.

This will allow me to continue to buy new manuals and pay their shipping costs.

It'll make you feel better, won't it?

**If you use Pay Pal or wish to use your credit card,
click on the secure site on my main page.**

PayPal Name Lynn@butkus.org

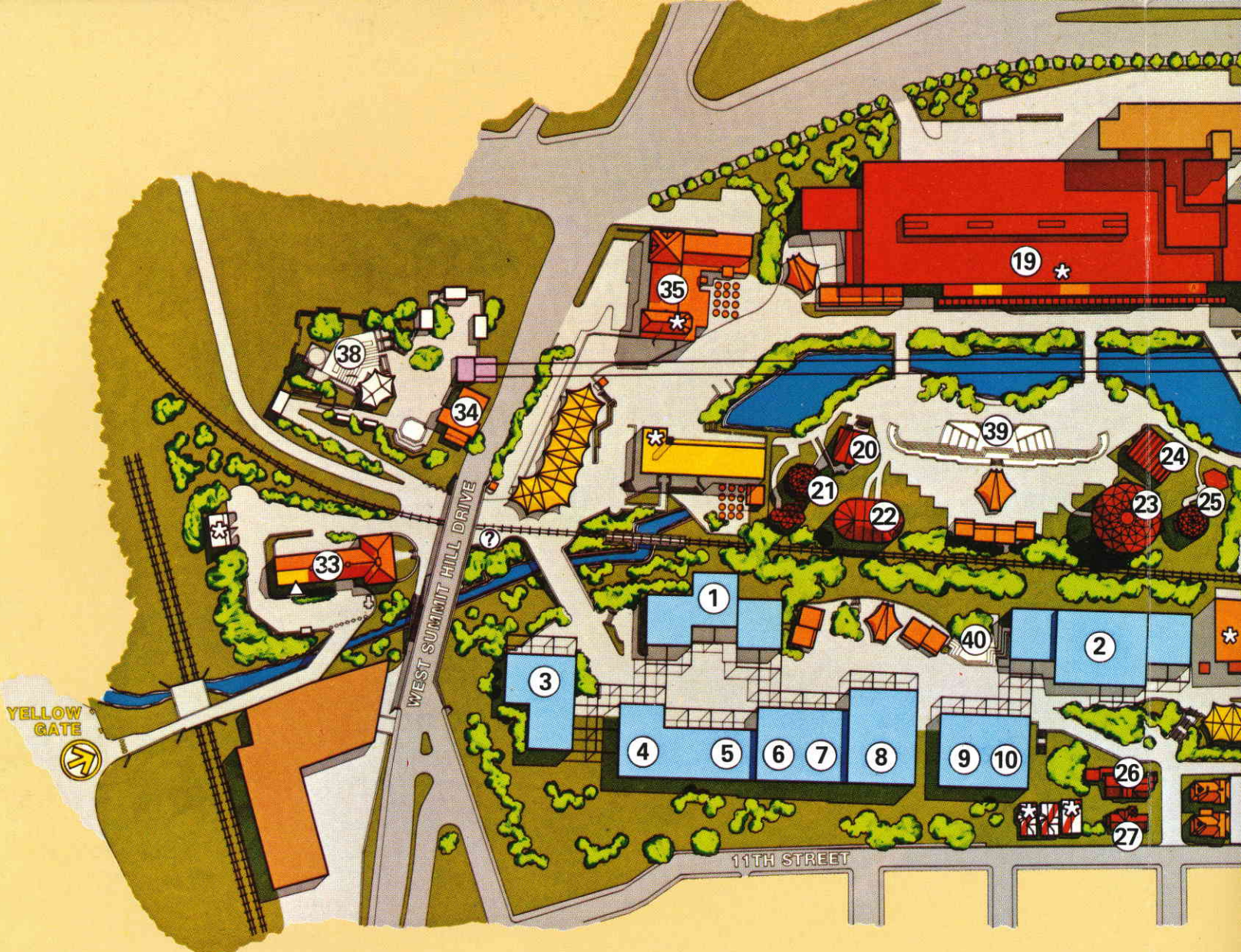
\$5.00
TAX
INCLUDED

OFFICIAL
GUIDE BOOK

The 1982 World's Fair



MAP
INSIDE



INTERNATIONAL PAVILIONS

- 1. Mexico
- 2. Japan
- 3. Republic of the Philippines
- 4. Italy
- 5. European Economic Community
(Belgium, The Netherlands, Denmark, Ireland, Luxembourg, Greece)
- 6. Federal Republic of Germany
- 7. United Kingdom
- 8. France
- 9. Hungarian People's Republic
- 10. Republic of Panama
- 11. Republic of Korea
- 12. Royal Kingdom of Saudi Arabia
- 13. United States
- 14. Australia
- 15. Canada
- 16. People's Republic of China
- 17. Egypt
- 18. Peru

CORPORATE PAVILIONS AND OTHER EXHIBITS

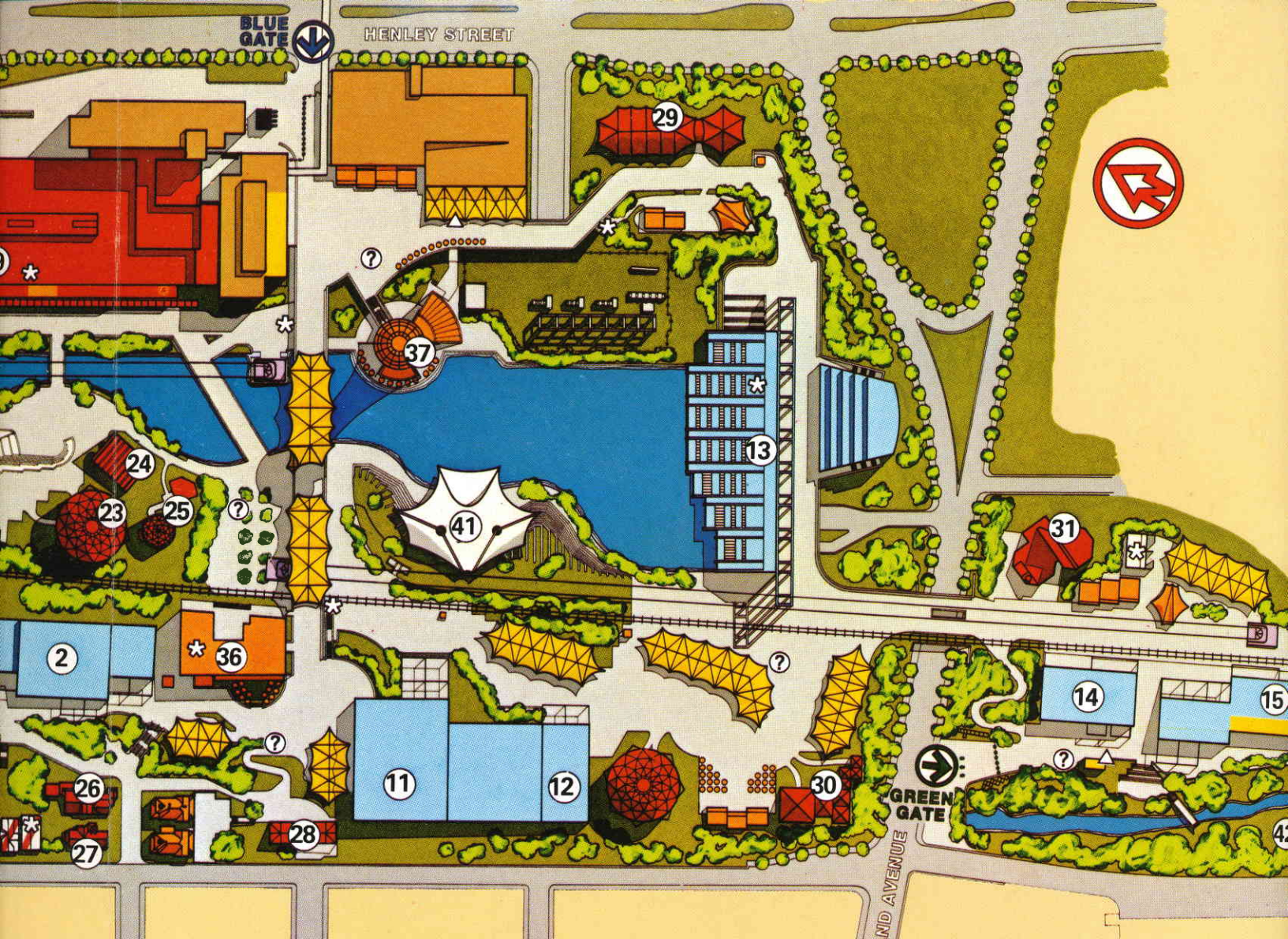
- 19. Technology and Lifestyle Center
(Multiple Corporate Exhibits)
- 20. Today's Solar Home
- 21. Home of the Future
- 22. World of Travel
- 23. Knoxville Health Pavilion
- 24. Baptist Ministries
- 25. Tenneco / Occidental
- 26. Conergy
- 27. A.C.T. '82
- 28. Budweiser Clydesdales
- 29. America's Electricity Energy Exhibit
- 30. Gas Energy Pavilion
- 31. Federal Express
- 32. TVA (The Valley Adventure)

FOOD SERVICE

- 33. S...
- 34. L...
- 35. I...
- 36. C...
- 37. S...
- Snack S...

WORLD FE...

- 38. Stok...
- 39. Inter...
- 40. Elm ...
- 41. State...
- 42. Seco...



Fort Sanders Neighborhood

FOOD SERVICES

Restaurant Buildings

- 33. Strohaus
- 34. L&N Hotel
- 35. L&N Station
- 36. Candy Factory
- 37. Sunsphere

Snack Shops

WORLD FESTIVAL OF ENTERTAINMENT

- 38. Stokely Van-Camp Folklife Festival
- 39. International Court of Flags
- 40. Elm Tree Theatre
- 41. State of Tennessee Amphitheatre
- 42. Second Creek Gazebo

VISITOR SERVICES

Emergency Services (971-HELP)

- First Aid
- Fire Station
- Lost Child Haven
- Baby Changing Station

Restrooms

- Telephones
- Drinking Fountains

Information

Stroller and Wheelchair Rental

Merchandise Shops

Amusements, Gondola, and Chairlift

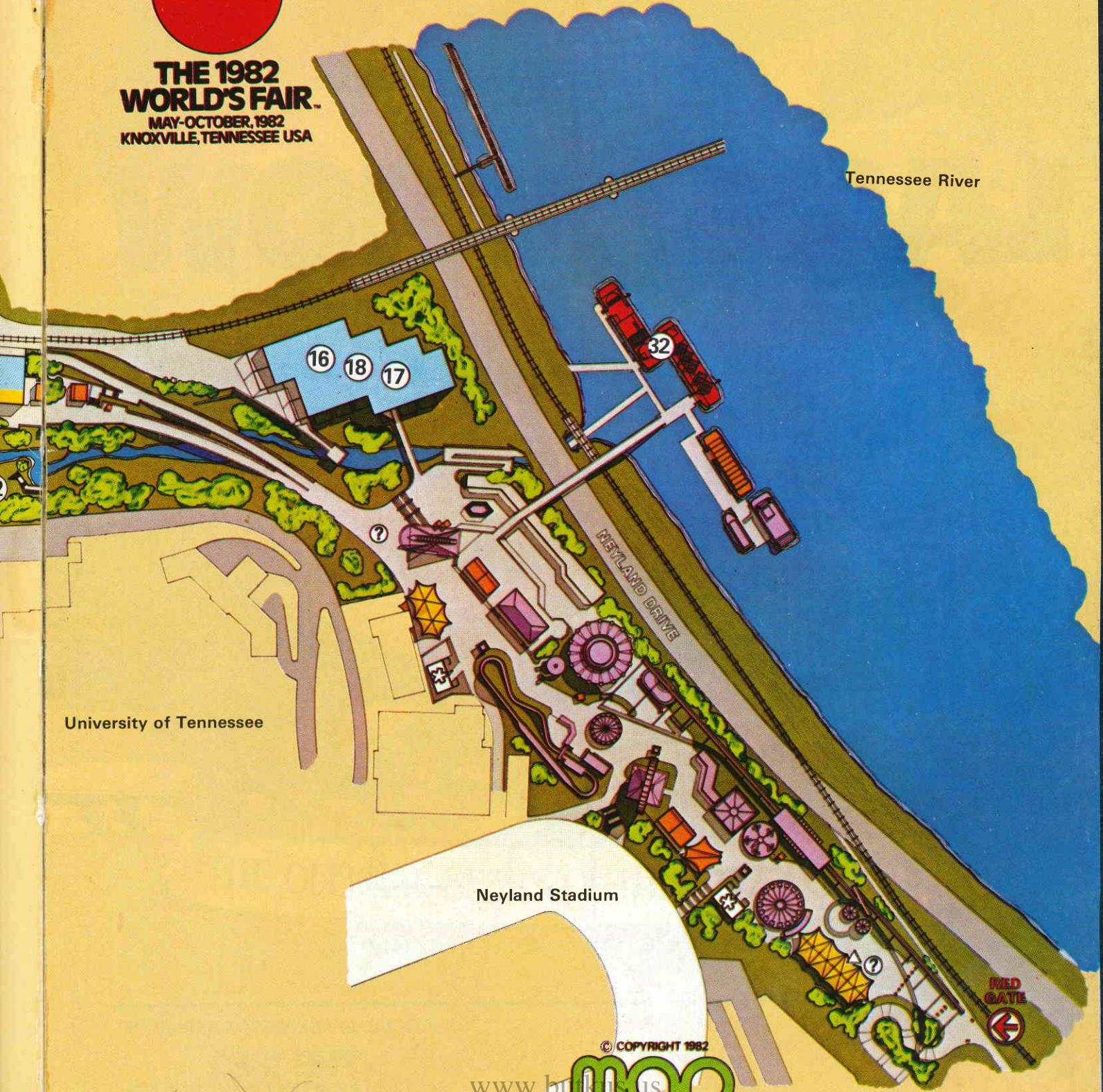
Lockers are located near Entrance Gates

AB N⁰⁰
1982



**THE 1982
WORLD'S FAIR.**
MAY-OCTOBER, 1982
KNOXVILLE, TENNESSEE USA

Tennessee River



University of Tennessee

Neyland Stadium

© COPYRIGHT 1982

www.bulkis.us



The information shown on this map is accurate as of March, 1982. ADDITIONAL INTERNATIONAL AND

DS
25

Discover Your Place Win A \$10,000 Va



e In The Sun cation Anywhere!

One visitor to the Holiday Beach Resorts "Your Place in the Sun" exhibition — located in the Technology and Lifestyle Center — will win a \$10,000 super-grand prize vacation anywhere.

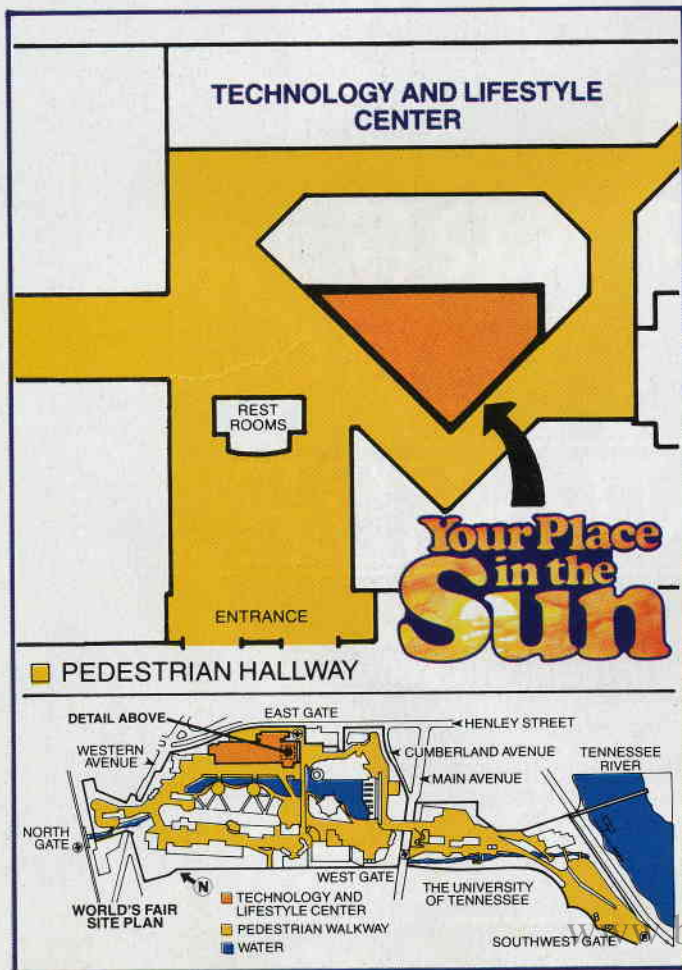
There will be 190 additional free prizes, worth a total of more than \$45,000 in free lodging, transportation and services to eligible visitors* to the "Your Place in the Sun" exhibition.

Don't miss "Your Place in the Sun" — your opportunity to discover the undiscovered vacation secret of Northwest Florida and the Mississippi Gulf Coast. And your opportunity to win valuable prizes!

Plus A free mini-vacation to Northwest Florida or the Mississippi Gulf Coast is YOURS when you and your family accept our invitation to meet with one of our vacation consultants after enjoying our audiovisual presentation. Relax for three days and two nights in luxurious beachfront accommodations valued at more than \$100 and absolutely free!

(*To become eligible, you and your family must attend one of our spectacular audiovisual presentations. More than three shows are offered every hour of each Fair day.)

Offer made to generate names to promote sales of timeshare units.



Your Place in the Sun

Holiday Beach Resorts
• a WINDHAM COMPANY •

©Holiday Beach Resorts 1982



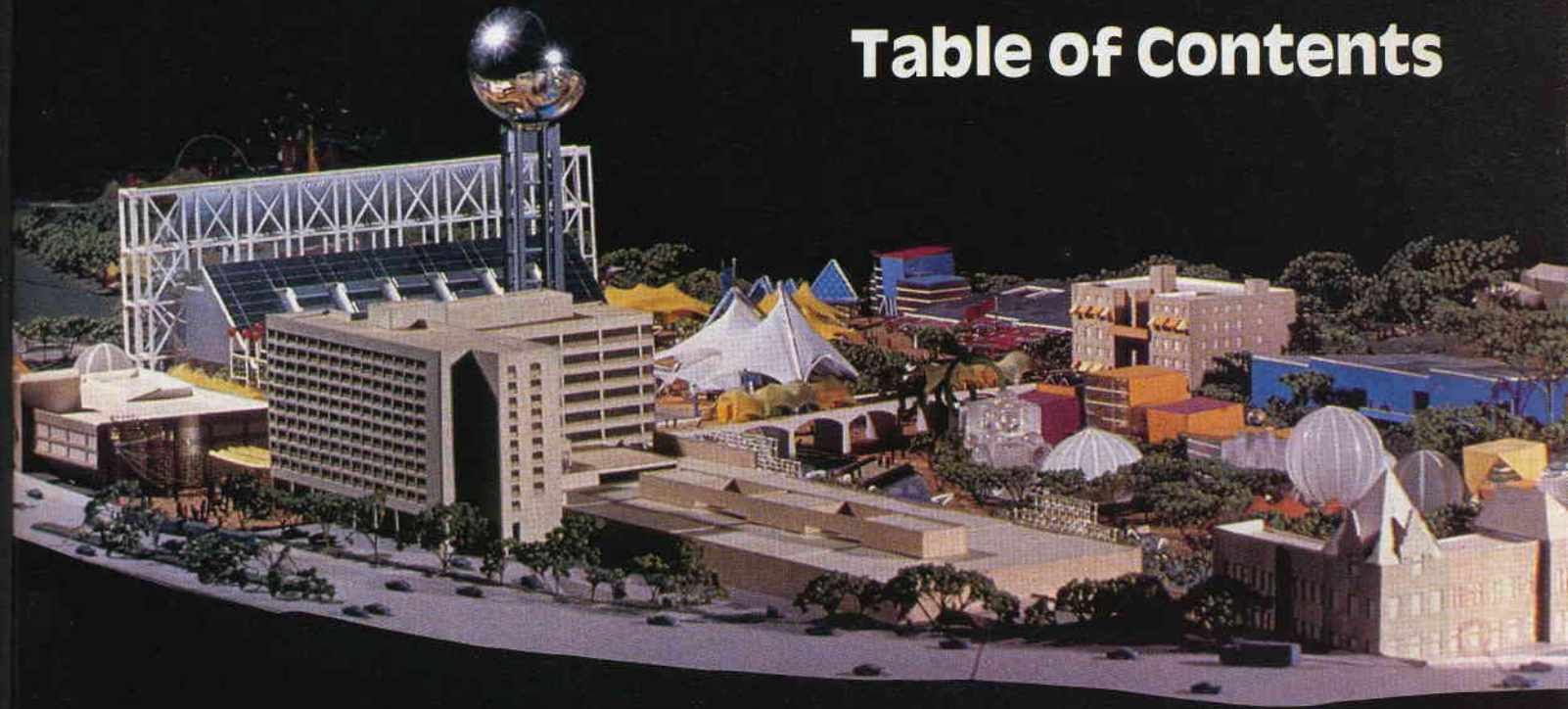
THERE ARE 21 COUNTRIES IN TENNESSEE.

Twenty-one countries from around the world are represented at the Fair, which Barclays is helping to finance—hardly surprising when you consider that Barclays is a world bank with branches in eighty countries spanning six continents. Barclays is a world leader in energy finance, and we're proud to be part of the Fair!

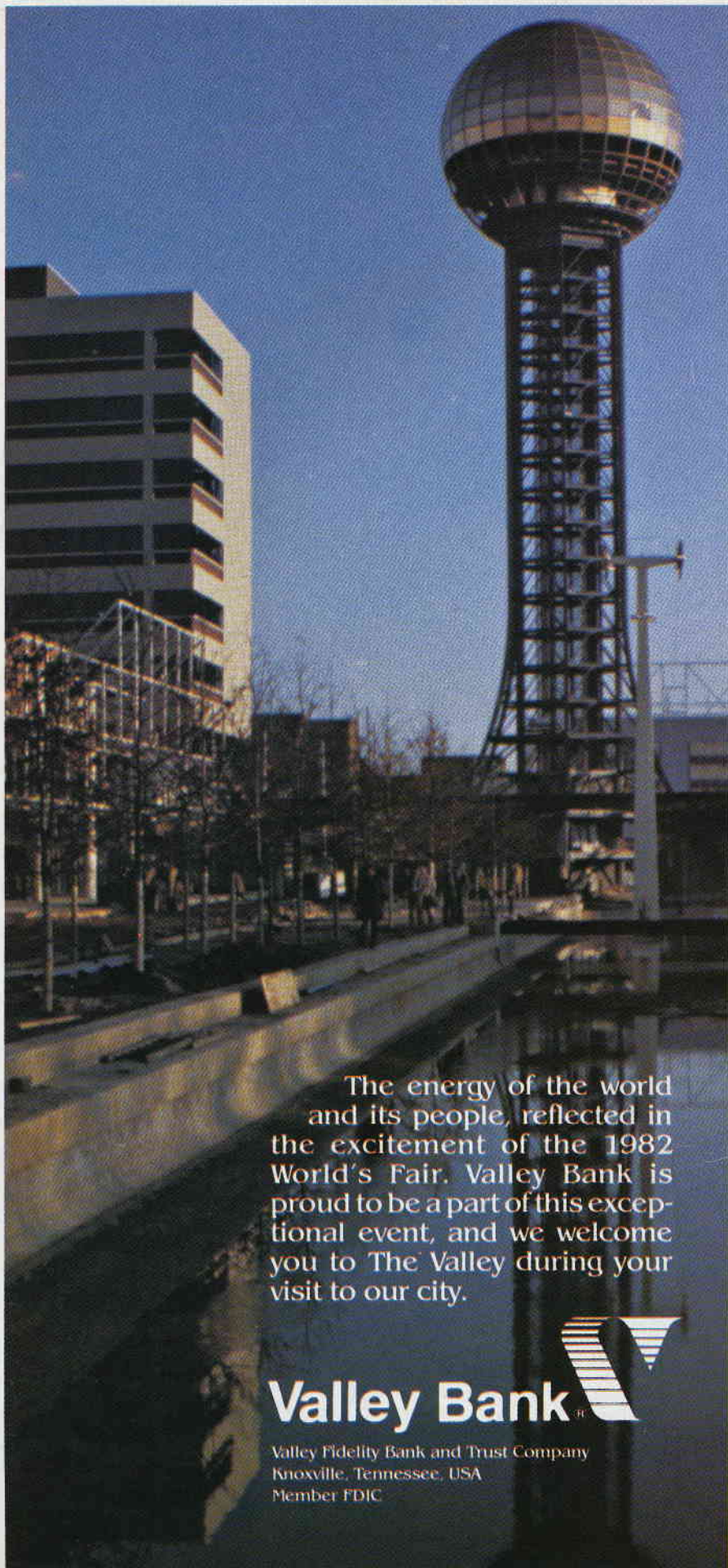


BARCLAYS
International

Table of Contents



9	Welcome Letters
Messages from President Reagan, KIEE Officers and others	
18	Energy
by Dr. E.G. Silver, Oak Ridge National Laboratory	
21	International Pavilions
Information on participating countries	
43	Domestic Pavilions
Working towards energy conservation	
59	Domestic Exhibits
Futuristic displays	
75	Corporate Sponsors
Participating corporations	
91	State Exhibits
Neighboring states working together	
97	Entertainment
Schedules of shows, concerts, sports	
117	Foods and Services
Restaurants, emergency services	
123	Good Neighbors
Stories on Knoxville and surrounding areas	
171	Yesterday, Today and Tomorrow
Past Fairs, Construction, Boards	



The energy of the world and its people, reflected in the excitement of the 1982 World's Fair. Valley Bank is proud to be a part of this exceptional event, and we welcome you to The Valley during your visit to our city.

Valley Bank



Valley Fidelity Bank and Trust Company
Knoxville, Tennessee, USA
Member FDIC



**THE 1982
WORLD'S FAIR™**

OFFICIAL GUIDEBOOK

Publishers:

Frank A. Franich
Fred M. Giessel

Editor:

Steve Kruse

Associate Editor:

Eileen Shelley

Contributing Writers:

Dr. Ernest Silver
Lori Price

Contributing Photographer:

Bill Roland

Advertising Director:

Fred M. Giessel

Advertising Sales:

John Bean
Preston Cury
Bob Crowder
Jess Giessel
Mike Ward

Advertising Reps:

Iwanna Inc., Asheville, N.C.
Bobby D. Corn
Wade Griffis
G.R. Media Ltd., New York, N.Y.

Production:

Norman Schieke
Deborah Law

Design & Layout:

Gene Achziger
Paul Franich
Edward Tsutakawa

Cover Art:

Jim Thorpe

Office Staff:

Ginny Baich
Barbara Teague
Norma Webb
Joy Taylor

Accounting:

Donna Hartley
Cherie Daugherty

Published by:

Exposition Publishers

Knoxville Office:
P.O. Box A-1151
Knoxville, Tenn. 37901
Phone (615) 546-2098

General Offices:
P.O. Box 517
Puyallup, Wash. 98371
Phone (206) 841-2481
Frank A. Franich
Fred M. Giessel

©1982 Exposition Publishers

President of the United States

Ronald Reagan



THE WHITE HOUSE
WASHINGTON

On behalf of the people of the United States, I wish to extend a warm welcome to all visitors to the 1982 World's Fair.

World's fairs provide an exciting vision of the future. They give hope and inspiration to the world community and help establish goals for human achievement.

Because energy is a major concern to all nations, the theme of The 1982 World's Fair, "Energy Turns the World," is not only appropriate, but will prove to be of great interest to all those attending this event. By emphasizing the exciting energy sources of the future, this Fair will help to bridge that gap between our energy needs and the resourcefulness of human creativity.

Again, let me extend a warm welcome to all those attending this festive event. May the many attractions of this Fair provide a wonderful and exciting experience for each of you.

A handwritten signature in cursive script that reads "Ronald Reagan".

Ronald Reagan
President of the United States

Chairman of The 1982 World's Fair

Jake Butcher



What lies ahead as you enter the site of The 1982 World's Fair will no doubt be an unforgettable experience for you and your family.

For the first time, a world's fair — in the tradition of great international expositions in Paris, London, New York, Chicago, Brussels, Osaka, St. Louis, San Francisco and Seattle — is being staged in the Southeastern United States. Those of us who make our homes in this part of the country are proud that the world is coming here to visit and are pleased that you are among the visitors.

The 1982 World's Fair has been in the works for seven years — years that have been some high peaks as well as some low valleys; but we think the 184 days between May 1 and Oct. 31 will make all the tireless efforts by so many dedicated people very worthwhile indeed. Seeing this event completed, successful, and people, such as yourself, enjoying it is certainly the highest high of them all.

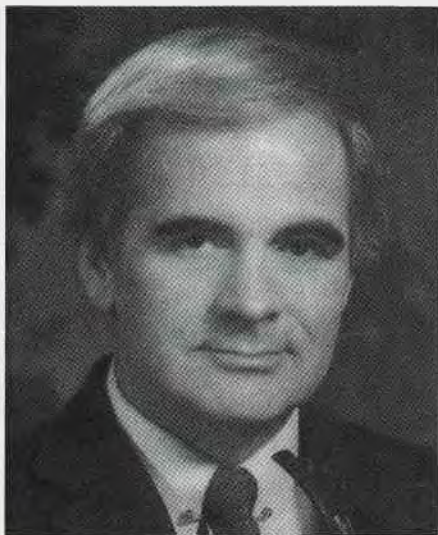
On behalf of the thousands of people who are The 1982 World's Fair, welcome. We hope you take with you many unforgettable memories of this once-in-a-lifetime event.

A handwritten signature in black ink that reads "Jake F. Butcher". The signature is written in a cursive, flowing style.

Jake F. Butcher
Chairman of the Board, The 1982 World's Fair

President of The 1982 World's Fair

S.H. Roberts Jr.



When you pass through the entry gates of The 1982 World's Fair, you will become part of an event which we hope will be an adventure of a lifetime.

More than 20 countries, 50 major corporations and some 5,000 employees will be giving their best to see that yours is a great experience.

What does it take to make a world's fair?

In 1975, permission was sought to hold a World's Fair in Knoxville, Tenn. — a world's fair that would have energy as its central theme. Approval was finally granted by the Bureau of International Expositions, Paris, France in 1977. Then the search for location, financing and participants began. Thousands of volunteers and a dedicated staff led the way to make the search successful.

After seven years of hard work, then, here it is: The 1982 World's Fair for you to enjoy. Welcome, and thank you for sharing with us the excitement of creating an historical event.

A handwritten signature in black ink that reads "S.H. Roberts Jr.". The signature is written in a cursive, flowing style.

S.H. Roberts Jr.
President, The 1982 World's Fair

Governor, State of Tennessee

Lamar Alexander



Welcome to Tennessee.

I know you will enjoy and never forget the excitement of The 1982 World's Fair taking place in Knoxville from May 1 to Oct. 31, 1982.

The world has come to Knoxville for six months. We want to share with you this international arena of culture, fun and excitement.

We also are eager to share all of Tennessee with you. People like to visit us. More people visit the nearby Great Smoky Mountains National Park than any other park in the United States. Millions more then go on to Nashville, Chattanooga and Memphis to hear Tennessee music, to enjoy our scenery and to experience our warm hospitality.

People like to live here. Rand McNally's new "Places Rated Almanac" picked our state's three largest cities among the best metropolitan places to live in the United States. Knoxville was 11th of 277.

Enjoy the world at the Fair. Take time to enjoy Tennessee, too.

Four and a half million Tennesseans join me in saying: We're glad you're here.

A handwritten signature of Lamar Alexander in black ink. The signature is written in a cursive style and reads "Lamar Alexander".

Lamar Alexander
Governor, State of Tennessee

U.S. Senator

Howard Baker Jr.



I take great pride in welcoming our neighbors from across the United States and the world to The 1982 World's Fair in Knoxville, Tennessee.

I have supported this monumental undertaking from its inception and am delighted to have you join with us in exploring the future, in celebrating our past, and in enjoying the excitement, the entertainment, the color and drama of this great world's fair.

For many years, East Tennessee has been known as the Energy Capital of the Country. As the home of Oak Ridge National Laboratories, the Tennessee Valley Authority and the University of Tennessee — an academic center of energy research — it certainly deserves the title.

Now as Knoxville hosts the world at this energy-themed exposition, few will dispute its claim as Energy Capital of the World.

As a representative of the people of Tennessee and a lifelong resident of the Knoxville region, I again welcome you to The 1982 World's Fair.

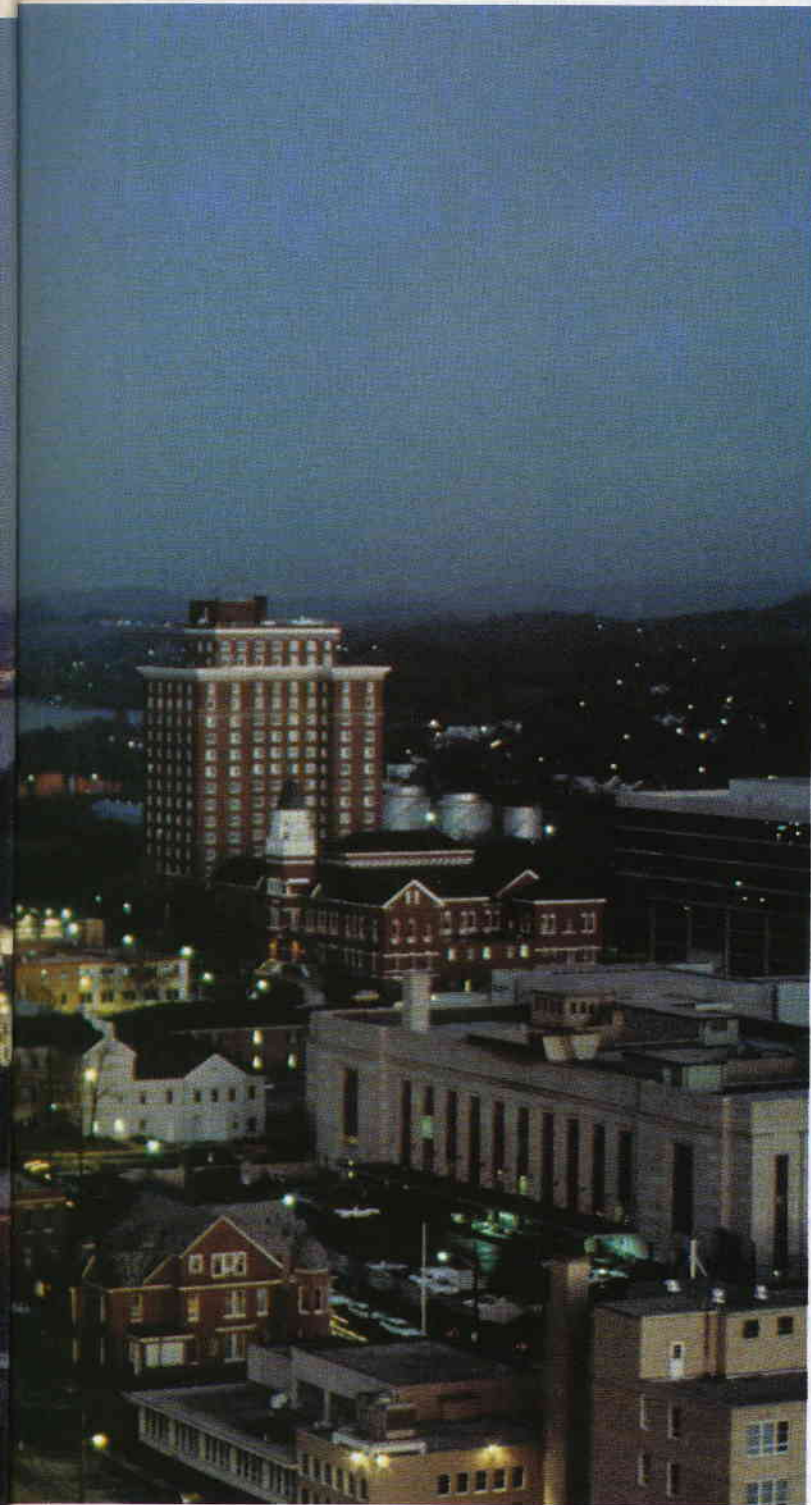
A handwritten signature of Howard H. Baker Jr. in black ink. The signature is written in a cursive style and reads "Howard H. Baker".

Howard H. Baker Jr.
U.S. Senator

Welcome to Knoxville

HOME OF THE 1982 WORLD'S FAIR





"Energy Turns the World" is the theme of The 1982 World's Fair.

It was chosen as a counterpoint to that negative catch phrase of the 1970s — the "Energy Crisis," a doom-and-gloom projection that cast the world into a shadowy and uncertain future.

Through focusing on the energy question and the creative energy of humankind, the Fair will demonstrate that tomorrow can bring new answers and a new quality of life.

Energy touches every aspect of life — whether it is the production of food or the manufacture of products. Despite this dependence, people are often unaware of energy's major role in their lives due to the separation of the common man from high technology and manufacturing processes. This tends to engender a sense of isolation...a feeling that energy problems are remote and beyond one's control.

The 1982 World's Fair, by giving a new understanding of energy, its wiser use and more efficient production, can help. It can help promote new and higher standards of life in less developed countries while maintaining high standards in nations that now enjoy them.

Knoxville is an especially appropriate site for a world's fair with an energy theme. One of the world's great energy centers, it is home of the Tennessee Valley Authority, the nation's largest public utility; the Oak Ridge National Laboratory, and the University of Tennessee, which conducts extensive energy research.

These institutions, along with the U.S. Department of Energy and a number of leading national corporations, are joining the Fair in sponsoring an international energy symposia series designed to spawn new solutions to the world's energy problems.

The three-part series brings together a body of international experts to analyze and define energy problems, to consider energy options and to reach a consensus on those with greatest promise for the future.

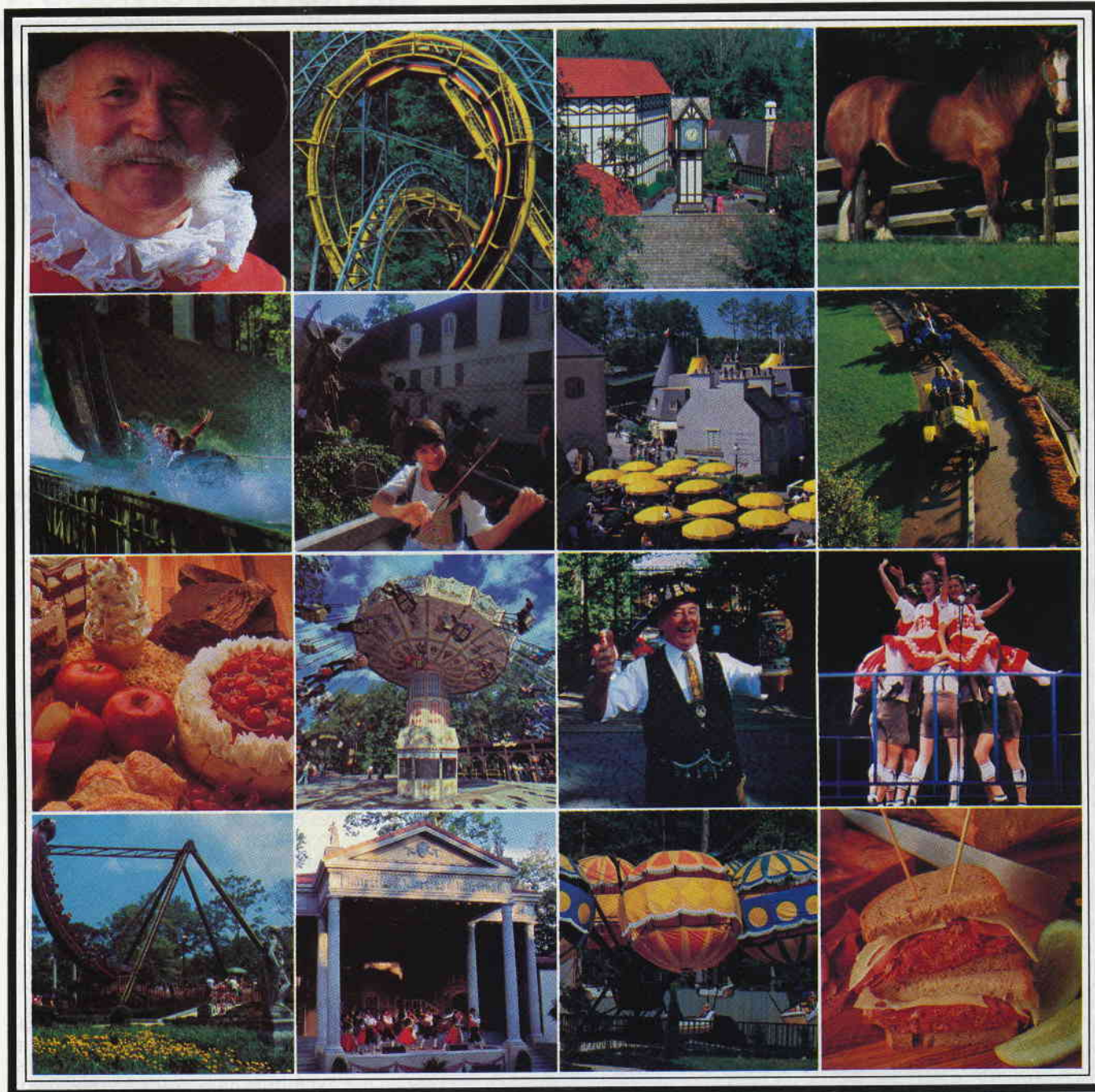
Every world's fair — from the first in London in 1851 to the most recent in Spokane, Wash. in 1974 — has been marked by innovations in science, the arts, architecture and commerce.

The 1867 World's Fair in Paris introduced aluminum and natural gas heat, as well as the first ice cream soda and the first department store. Inventors displayed the telephone, typewriter and elevator at The 1876 World's Fair in Philadelphia. Exhibitors demonstrated television for the first time to the public in The 1939 World's Fair in New York City.

History may be made again in Knoxville.

By providing a showcase where nations, states, industries and organizations may address the energy concerns of humankind, The 1982 World's Fair marks a turning point in the understanding of energy.

ALL'S FAIR AT THE OLD COUNTRY, BUSCH GARDENS.



The fairest land of all is The Old Country, Busch Gardens, an authentic re-creation of the Europe of yesteryear set in beautiful, historic Williamsburg, Virginia. At The Old Country, you can enjoy delicious European food, exciting rides and the finest in live entertainment. In Germany, the rollicking Das Festhaus re-creates the spirit of Oktoberfest. At La Piazza di San Marco, you can sample the classic cuisine of Italy while strolling violinists serenade you. The Three Musketeers Theatre in France presents international performers in acts that are *magnifique*. And in England, you'll thrill to what may be the scariest roller coaster in the world: the thirteen-story Loch Ness Monster. One admission price includes over 100 rides, shows and attractions. It's the fairest of the Old World plus all the latest thrill rides of the New. And it's only at The Old Country, Busch Gardens, Williamsburg. Just 5 minutes away from Colonial Williamsburg and one hour from the beautiful Virginia Beach area. For more information, write The Old Country, Busch Gardens, P.O. Drawer FC, Williamsburg, VA 23187. **TAKE THE GRAND TOUR OF EUROPE.**

**The
Old
Country**
BUSCH GARDENS
WILLIAMSBURG, VA.

U.S. Senator

Jim Sasser



It is my pleasure as a U.S. senator from Tennessee to wish you a fun-filled and interesting visit. The 1982 World's Fair affords you a wonderful assortment of entertainment and educational exhibits which relate to the energy achievements and needs of countries throughout the world.

You will enjoy sampling the cultures and the foods of people from around the globe. I believe the Fair represents a great step forward in relating important public concerns — such as energy — to a truly unique variety of entertainment and exhibits.

Again, welcome to The 1982 World's Fair. I hope you also have the time to visit other major tourist attractions in every section of the state, beginning with the Great Smoky Mountains nearby.

Tennessee is a great state for fun. Have a good time.

A handwritten signature in cursive script that reads "Jim Sasser".

Jim Sasser
U.S. Senator

U.S. Representative

John Duncan



I would like to take this opportunity to welcome you to East Tennessee and The 1982 World's Fair.

This region has a reputation for its beauty and its people's hospitality, both of which I am sure you will enjoy during your stay here.

We take pride in our surroundings and achievements, and we are more than happy to share them with you. The people of this area have been preparing for this historic event since 1974, and finally their labors have borne fruit.

The energy theme provides a common thread tying together the many diverse and international exhibits at this exposition. There will be at least 21 nations participating including, for the first time at any world's fair since 1904, the People's Republic of China.

I hope you will be both enlightened and entertained by The 1982 World's Fair and leave with pleasant memories and thoughts of returning to this unique region of our country.

A handwritten signature in cursive script that reads "John J. Duncan".

John J. Duncan
U.S. Representative, State of Tennessee

U.S. Commissioner General

Charles Fraser



As the U.S. Commissioner General, it is my pleasure to welcome you to The 1982 World's Fair.

During the past two years, I have had the opportunity to observe the talents, skills, and labors of the extremely dedicated Knoxville International Energy Exposition organization, and the vigorous support of the federal government. I am truly proud of their accomplishments and feel honored to be part of this worldwide event that the Knoxville community is hosting.

Just as in past great world's fairs, where nations have joined together to share with the world their unique cultural heritages and technological developments, so it is in Knoxville where the international community will explore and exchange the inventions of science and the splendid creativity of human energy. Together we will make The 1982 World's Fair a remarkable and memorable experience. Together we will grow, learn and share these new ideas in our quest for global peace and harmony.

A handwritten signature in cursive script that reads "Charles E. Fraser".

Charles E. Fraser
U.S. Commissioner General, The 1982 World's Fair

Chairman of the Fair Management Committee

Thomas Bell



It is with special pride that I welcome you to Knoxville and The 1982 World's Fair. Your visit to this great international exposition is certain to instill in you memories to last a lifetime. I am sure that the great state of Tennessee, the beautiful Smoky Mountains and our well-known Southern hospitality will provide some of those memories.

We Tennesseans are proud to be hosting an event of this magnitude. It is a unique opportunity to meet people from many nations, to experience their lifestyle, and their artistic, technological and cultural contributions to world progress. As you discover so many things about our neighbors around the world, we know you will have learned something about yourself also.

There is something at the Fair for everyone and to remember always. We are glad you are here, we hope you have the best of times, and we look forward to the day you return.

A handwritten signature in cursive script that reads "Thomas R. Bell".

Thomas R. Bell
Chairman of The 1982 World's Fair Management Committee

International Energy Symposia



The International Energy Symposia Series is the principal educational activity of The 1982 World's Fair and serves as the energy cornerstone for the Fair. The purposes of the Symposia Series is to provide the opportunity for experts in energy-related areas to identify and discuss crucial energy issues, to explore factors and inter-relationships involved in a world-wide transition to higher energy productivity, to evaluate current international energy policies, and to formulate constructive solutions for increasing energy productivity in the way that energy is produced, converted and consumed.

Symposium I

Symposium I was conducted Oct. 14-17, 1980. Representatives from 35 nations focused on defining the nature and extent of the world energy problem. Four fundamental issues were addressed:

- World Energy Productivity and Production: The Nature of the Problem
- Improving World Energy Productivity and Production: The Role of Technology
- Toward an Efficient Energy Future:

Critical Paths, Conflicts and Constraints

- Alternative Policies for Improved Energy Productivity and Production

Symposium II

Symposium II was conducted Nov. 3-6, 1981, and provided the participants from 35 nations an opportunity to conduct an in-depth analysis and discussion of the topics identified to be of world significance in Symposium I. The program format for Symposium II was built around a work and plenary sessions' format. Each of seven concurrent work sessions were keyed to a position paper and a case study. Four of the work sessions were organized around geographic divisions of the world:

- Industrialized Nations: Market Economies
- Industrialized Nations: Non-Market Economies
- Energy Surplus Industrializing Nations
- Energy Deficient Industrializing Nations

Three work sessions focused on issues of world-wide significance:

- Nuclear Energy
 - Biomass Energy
 - Energy for Rural Development
- Plenary sessions were devoted to

special topic presentations on Alternative Energy Futures, International Institutional Arrangements, and integration of work sessions. Based on this analytical discussion and integration process, recommendations and resolutions were made for Symposium III.

Symposium III

Finally, the third symposium will be conducted May 24-27, 1982, and is designed to bring to a conclusion the work performed in symposia I and II. A group of distinguished energy experts from around the world will meet a final time to ratify the findings of the previous symposia. Dr. Armand Hammer, chairman of the board at Occidental Petroleum, is the chairman of Symposium III.

Ministerial-level individuals and technical experts will seek a process for the continuation of an exchange of technology and resources.

The final outcome of the International Energy Symposia Series will be the identification of global energy commonalities and an agenda for continuation of the deliberations. A world-wide communique announcing the conclusions will be issued at the close of Symposium III.

Energy: effective force

Energy cannot be seen or felt as other raw materials like iron or water or wheat, but it figures more prominently in our everyday lives.

Until the 19th century, even scientists did not clearly understand the concept of energy. Each of its manifestations — heat, motion and electrical phenomena — was separately studied and thought to be quite disconnected.

Today, we understand energy to be the capacity for doing work — for heating, for moving people and goods, for turning machines, for shaping and joining metals, for lighting and communicating, and all the thousands of other activities that animate our world.

And we understand that all forms of energy share the same basic nature and can often be substituted for another.

Long ago, men's muscles, plus those of a few domesticated animals, provided all the energy he had, and only wood provided heat and light. As a result, lives were hard and material goods were few. Then man gradually learned to harness other sources of energy — the wind to propel ships, water to turn wheels, and wood to burn for steam.

As man learned to control these energy sources, his appetite for energy grew. This was partly because his numbers increased and partly because he learned to enrich his life by using more energy per person. When man created machines that burned wood to make steam, he began to outstrip the sun's ability to supply that energy as fast as it was being used up. Forests were being cut down faster than they could grow back, and energy began to be in short supply.

But then man learned that the earth houses vast stores of the sun's energy, collected and stored millions of years ago in the form of coal, petroleum and natural gas. We call these energy sources fossil fuels because they are the remnants of plants and animals that once lived and stored solar energy.

Mankind began to use these fossil fuels in ever-increasing amounts to build and move and shape, and to grow more food as the world's population mushroomed.

Now, man is beginning to un-

derstand that these stores of fossil energy, though large, are limited. He has learned that in the not-so-distant future he will have exhausted at least some of them, especially the oil and gas on which he has come to rely to power his cars and trucks, make fertilizers and plastics, heat homes, and make steam from electricity. In just a few decades, man has used up a major portion of the fossil energy the earth has stored during hundreds of millions of years.

So now, humanity is faced with a terribly urgent problem: What will we do when the supplies of gas and oil become scarce, and how can we save some of them for the non-fuel uses we need? This is the problem we call the "energy crisis."

First, let's be clear about what the energy problem is, and what it is not. The world is not "running out of energy." The sun still shines and delivers its bountiful energy; there are still vast supplies of coal, oil-shale and tar sand. Nuclear energy, a resource not derived from the sun, is virtually limitless.

Deuterium, found in ocean water, will be another inexhaustible source of energy once we learn to make use of it in fusion reactors.

The true problem is really threefold. First, we are rapidly depleting the known reserves of liquid petroleum, and at least for the next decade or two none of the other more plentiful energy sources can be substituted for it in its most important use: powering the world's motor vehicles, at least not economically.

This brings us to the second part of the problem. None of the alternative energy sources can provide cheap energy. The era of abundant, cheap energy is past, and this imposes wrenching and often painful adjustments to our economy. The great ongoing debate about future energy is not about which source will be cheap (none will), but about which mix of resources and uses will be least costly and most acceptable.

The third aspect of the energy problem concerns the environment. All energy options can have adverse impact on the environment, and their wastes pose potential dangers. This includes acid rain and sulfur from oil and coal, radioactive wastes from fission and fusion, large volumes of tailings from all low-concentration sources of fuels, strip-mine damage to





our land, and huge land needs for solar collectors.

This is not to say that these problems cannot be overcome, but managing them adds costs and risks that must be understood, evaluated and finally accepted realistically. The potentially most intractable environmental problem is the unacceptable world climate change that may be caused by increasing the amount of carbon dioxide in the atmosphere by burning fossil fuels in great quantity. This may effectively prevent us from using all our vast remaining fossil energy reserves.

So how can the world deal with this threefold problem?

The first major answer is conservation, using less energy. This does not mean living less comfortably; it means getting more use out of a given amount of energy by wasting less and using it more efficiently. It is accomplished by more fuel-efficient cars, better-insulated buildings, more efficient machines and appliances, less fertilizer and fuel-intensive agriculture, and the like.

Higher prices have already caused much of this to happen in the United States. In the decade from 1970 to 1980, energy use rose less than half as much as the increase in the Gross National Product. Most experts believe that much more can still be achieved so that energy growth can continue to be slowed down.

Here, each individual can do much to help since the ultimate result depends on millions of decisions and actions by home-owners, consumers and workers.

The other part of the answer is new technology. The key concept is substitution — replacing scarce energy (oil and gas) with plentiful alternatives (uranium, deuterium, coal, oil shale and solar). This is where much of the scientific and technical challenges lie.

This list barely scratches the surface. The energy future offers a limitless perspective of new technologies, new opportunities for involvement by all of us, new global interdependences, new ways of living in harmony with our earth. The 1982 World's Fair casts a light into that future by which we can glimpse its promise.

Editor's note: Dr. E.G. Silver is assistant manager of the Nuclear Standards Management Center at Oak Ridge National Laboratory.

Thinking Ahead.

To October, 1982 and Beyond.

A successful World's Fair continues helping a community long after the last sign comes down.

Consider Seattle or Montreal—and the booming corporate growth they've enjoyed. The attention continues, and with it comes new businesses, new buildings, and new corporate banking needs.

At Park National, we stand ready to help corporations take full advantage of this growth. With crucial capital when you need it. With innovative, tailored cash management programs. With pension plans and international access.

The Park has been helping East Tennessee companies grow for over 50 years, and growing with them. Today we offer you the most modern cash management skills, along with considerable financial muscle.

If you're considering relocating, expanding, or just want to consult with us about your financial needs, call one of our corporate banking officers at (615) 521-5100. See how our "Thinking Ahead" philosophy helps you.

Thinking ahead,
so you can.

PARK
Park National Bank
Member FDIC





**Faces of the World...
International Pavilions**

International Pavilion

United States of America



Country: United States of America
Language: English
Population: 220 million
Area: 3.615 million square miles

"Talk-back" computers and a specially commissioned IMAX motion picture are highlights of the United States Pavilion at The 1982 World's Fair.

There is enough computer and electronic wizardry to fascinate both the serious student of energy and the inquisitive child.

The \$1.2 million IMAX film literally shows the "big picture" of America's energy resources and technology. This cinema spectacular, produced and directed by Oscar-winner Francis Thompson, is projected onto a screen 65 feet high and 90 feet wide.

The 33 "talk-back" computers, placed throughout the five exhibit levels of the U.S. Pavilion, allow individuals to pursue the energy subjects that interest them most. Visitors are able to touch computer screens and call up either cinema or written information about a multitude of energy-related topics.

More than 400 industrial films were carefully screened and edited for this project by Ramirez and Woods, the Manhattan firm that designed the U.S. Pavilion's exhibits. Random-access programming of the computers provides a variety of subject sequences for visitors to call up.

This new process was made possible by an integration of three sophisticated technologies: Sony of

America's laser discs, Apple Computer Inc.'s software, and the "touch-sensitive" video screens of Elographics, Inc., an Oak Ridge, Tenn. firm. All three corporations have loaned equipment to the U.S. Pavilion for the duration of the Fair.

The \$12.4 million U.S. Pavilion lies at the center of the 72-acre exposition site. Visitors enter the pavilion on a spacious concourse between the main exhibit hall and the IMAX theater. They are then transported by escalators to the topmost of the five exhibit levels, through which they descend.

In brief, the five exhibit levels will include the following:

Introduction

The main element of this level is a curving time sculpture that illustrates the changing mix of energy resources in our history and the accelerating rate of their consumption. Geographical distribution of energy sources, both in the United States and around the globe, is depicted by changing images on map formats. Talk-back computers provide animated presentations of key energy terms, which give the viewers a frame of reference for the following exhibits.

History

Six public expositions from the American past are presented as chronological milestones. Depicted both pictorially and with artifacts, they summarize the changing roles of various energy resources in American history since the early 19th century. A battery of newscasts bring pavilion guests up-to-date on challenges to American energy developers and procedures.

Transition

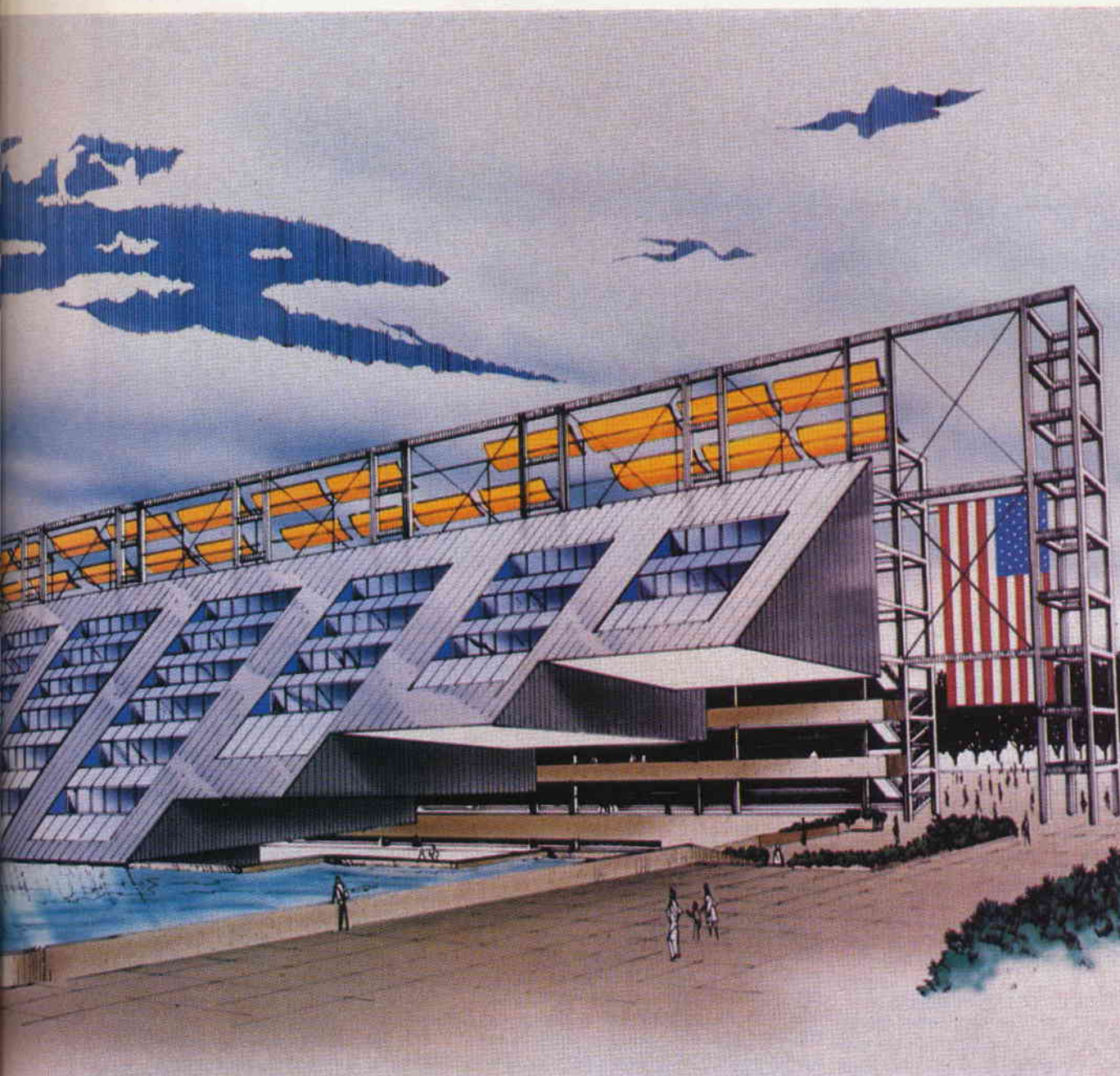
On the third deck, visitors are immersed in a national energy debate presented on 20 video monitors. By pushing a button, visitors can bring to life a cross-section of Americans, who relate their opinions on energy issues. Overhead, at the center of the deck, a suspended light sculpture that portrays energy supply and demand serves as an introduction to the next two exhibit levels.

Demand

A glowing tower of light expresses the proportionate uses of energy in



four major areas: industry, home, transportation and commerce. Talk-back computers illustrate "hidden energy" in an array of typical industrial and agricultural products by revealing the amount of energy needed to bring them from the state of raw materials to finished consumer items. Component parts of an automobile, provided by General Motors, show modern internal combustion technology. Visitors can



enter a transparent house to examine energy-conserving features that can be added to existing homes.

Supply

On the ground level, visitors are invited to examine, in more detail, video displays about nine major fields of energy production: coal, oil, natural gas, nuclear power, hydropower, biomass, geothermal, solar and other energy forms such as wind power.

Additionally, pertinent tools and artifacts from each of these industries are exhibited.

On the whole, this exhibit will leave an impression that the United States is optimistic about its ability to meet its day-to-day and long-term energy requirements.

All U.S. Pavilion exhibitry, including the IMAX film, are open to Fair visitors at no cost.

Architects

Finch, Alexander, Barnes, Rothschild, Paschal, Inc.

International Pavilion

Italy



Country: Italy
Language: Italian
Population: 57.217 million
Area: 117,492 square miles

The Italian Pavilion focuses on the contribution made in the past centuries by Italians in the field of science and technology as it relates to the production and transportation of energy. It also reviews the develop-



ment of renewable sources of energy.

At the entrance of the Italian Pavilion, an exhibit is dedicated to the 40th anniversary of the first self-sustaining nuclear chain reaction which took place Dec. 2, 1942, in Chicago during an experiment carried out by a small group of scientists led by the Italian physicist, Enrico Fermi.

At the left-front of the Italian Pavilion, CNR*-Pininfarina exhibits a full-size model of an automobile which was designed as part of a CNR research project "Aerodynamic Improvements of Vehicles."

The pavilion is divided into four different sections:

Production of energy

Included in this section are the CNEN scale model of its fuel-elements testing reactor, PEC; data on the worldwide activity of refining, exploration, and production for oil, gas, uranium and coal by ENI; a display of the NIRA reactor, "Superphenix;" and a look at the production of oil by EFIM.

Transmission of energy

The second section of the pavilion shows a scale model and panels of an experimental 1000k V electric transmission line built at Suvereto, Italy,

by ENEL using Pirelli cable; the townwide, house-heating plant with water heated in a single, central plant by FINMECCANICA; and ENI's glove-girdling network of gas pipelines.

Renewable sources of energy

Photovoltaic cells and geothermal-powered electric generation are the main focus of the DNEL display. Renewable energy sources are also featured in the geothermal, agro-industrial display and in the CNEN's exhibit of the TOKOMAK installation and the DELPHOS photovoltaic plant.

FINMECCANICA showcases its miniature generating plant, reversible turbine hydroelectric plants, pioneering work on solar energy, and applications of photovoltaic cells.

ELECTROCONSULT shows its large-scale geothermal work in IMPREGILO presents examples of their work. EFIM exhibits solar panels and a solar-powered boiler.

The ENI presence in this section takes the form of nuclear and geothermal power, a solar-powered farm, desalinization, solar cells, aeolic power and an anaerobic digester.

Energy saving

FINMECCANICA shows a co-generation plant that uses waste heat from other plants and a modular-engine by Alfa Romeo allowing differentiated use of fuel with savings in urban traffic of up to 20-30 per cent.

EFIM exhibits light-weight railway rolling stock, a "Blue Flame" furnace and a heat-pump.

International Pavilion

France



Country: France
Language: French
Population: 53.71 million
Area: 212,736 square miles

A model of the world's fastest train, the "Bullet Train," and cars of the future are featured at the French Pavilion — a pavilion dedicated to conservation of energy and production of nuclear electricity.

The exhibit, covering an inside area of 11,932 square feet and an outside area of 2,285 square feet, is near the pavilions of the United Kingdom and the European Economic Community.

The exhibit stresses conservation gains made in recent years. In France energy conservation amounted to 13 percent of the total consumption in 1980 and it is expected to reach as high as 27 percent in 1990. This is the result of careful planning and research in different economic sectors.

A section on transportation highlights the development of the Bullet Train, also known as the TGV, which goes as fast as 235 mph between Paris and Lyons. It has been calculated that the cost of tran-

sporting one passenger by the TGV is equivalent to the cost of fuel alone in carrying one passenger by air over the same distance (372 miles). This fantastic modernization of the railway system is shown in the exhibit as an electrified scale model.

In the same vein, a life-size model of the car of the future is also displayed: the Renault EVE economy research vehicle. Thanks to drastic improvement in air drag reduction (0.239) and advanced electronic control of engine and transmission, gasoline consumption figures achieved are 57 mpg at 56 mph and 43 mpg at 75 mph for this medium-sized sedan.

Because France has always played a pioneering role in the field of natural sources of energy, a solar home model shows French techniques as well as lines of improvement currently being tested.

The display of a reconstituted, and much faster, breeder-reactor illustrates France's head start in the nuclear-electro industry. Visitors are allowed to walk into the core of the reactor and can obtain information regarding the security measures adopted to maintain a very high production. Also on exhibit are models related to off-shore petroleum research.

A gigantic map of France enlivened

with energy-related scenarios at their proper locations outlines the country's technological progress accomplished. Under the map, a room equipped with an audio-visual system enables visitors to enjoy a technological tour of France. The ceiling of the room is built with mirrors in a fashion similar to solar panels to enhance and multiply the viewing of the map and its models.

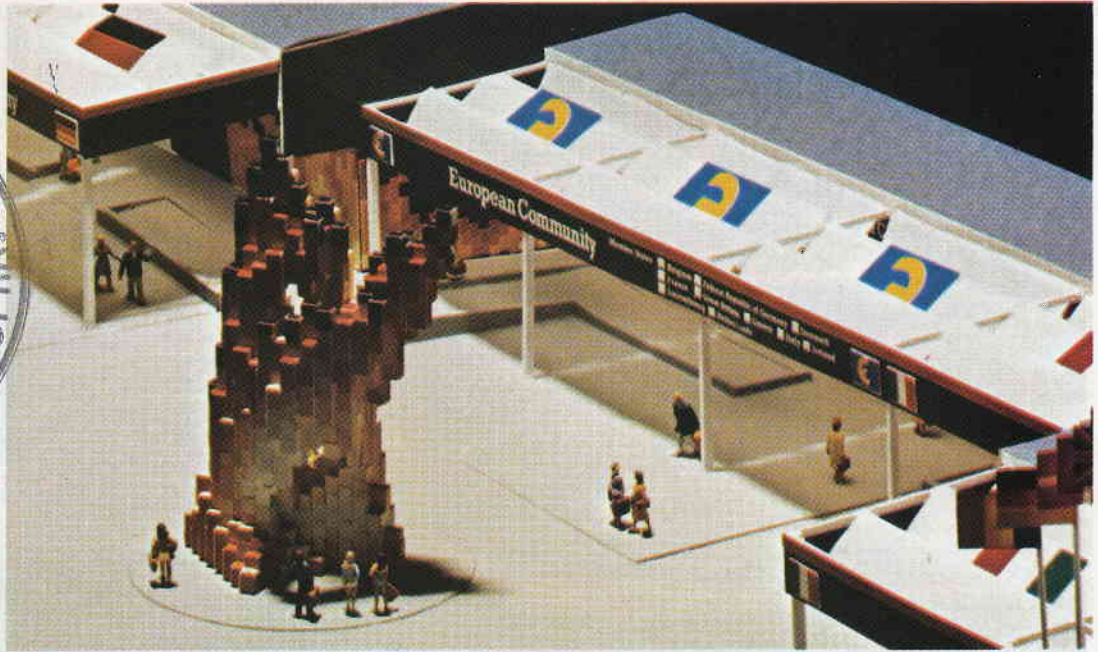
The French exhibit also houses several museum pieces to stress the importance of science to the arts. Two electric engines (one by Froment, the other by Pixii), evidence of the first technological achievements of the 19th century, are on permanent display.

The governmental body in charge of the French Pavilion for The 1982 World's Fair is the "Direction des Relations Economiques Exterieures," part of the Department of the Ministry of the Economy.



www.butkus.us

European Economic Community



Countries: European Economic Community

Belgium, France, Federal Republic of Germany, Italy, Luxembourg, The Netherlands, Iceland, United Kingdom, Denmark and Greece

Languages: Danish, Dutch, English, French, German, Italian, Greek

Population: 270 million

Area: 680,944 square miles

The European Economic Community unites 10 nations — Belgium, France, Federal Republic of Germany, Italy, Luxembourg, The Netherlands, Iceland, United Kingdom, Denmark and Greece — in a common desire to establish a peaceful and prosperous Europe.

The goals of the Community (to improve and sustain economic well-being in Europe to guarantee peace among the member states and to help other nations with trade and aid) are an integral part of this exhibit.

The energy theme of the Fair is also of particular importance to the Community. Even before the outbreak of the "energy crisis," it had attempted to formulate and to implement a common energy policy

among its member states.

These common policies are considered fundamental factors in the creation of European unity, the idea being that positions taken jointly by a group of industrialized countries with more than 270 million inhabitants will carry far more weight on the international scene.

As an outgrowth of this idea, energy conservation is a keynote of the European Economic Community's presentation, with common energy policy and projects being highlighted.

After conservation, the Com-

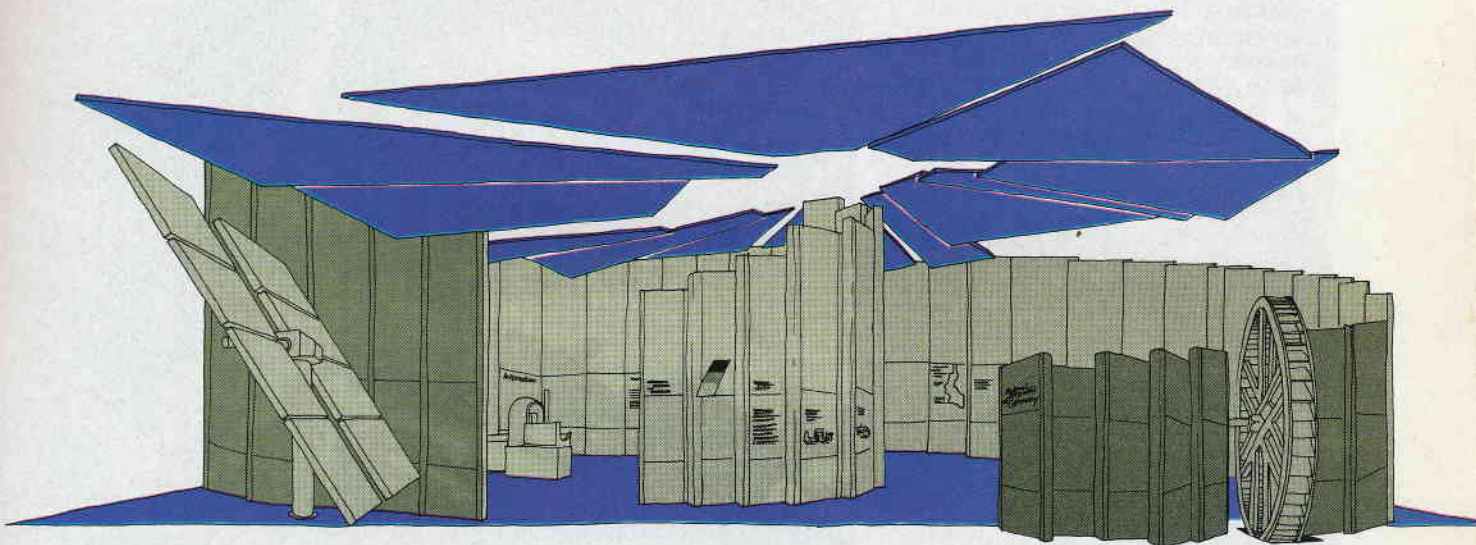
munity's exhibit focuses on research and development programs it has implemented. One such project the European Economic Community is showcasing is Eurelios, a \$25 million solar plant at Adrano, Sicily.

Fair visitors can also see JET — Joint European Torus — the next major step in the Community's fusion program. When it begins operation near the end of the decade, JET will be the world's largest Tokamak device. It may also provide a missing link between existing experiments and an experimental fusion reactor.



International Pavilion

Federal Republic of Germany



Country: Federal Republic of Germany
Language: German
Population: 61.3 million
Area: 95,994 square miles

"Energy In Mind," Germany's exhibit for The 1982 World's Fair, is a powerful graphic display that presents Germany in progressive, dynamic terms.

Spiraling inward towards its core, the exhibit proceeds in steps and begins with an introduction of Germany — its sociology, architecture, art and culture.

The complexity of the story is in

direct contrast to the simple lines of the aluminum columns upon which photos and materials are mounted. Overhead, multi-colored sails cover the ceiling, coming together at the pavilion's center. The floor of the pavilion is especially beautiful, made up of three-color ceramic tiles arranged in a quarter-circle pattern.

Following the spiral still farther, visitors glimpse historical developments in research and technology that have formed the foundations for today's miracles and tomorrow's hope.

Emphasis is placed on the production, conservation and future of energy. Among the displays are solar panels, a dynamics machine from Werner Von Siemens, and a full-sized, operating overshot waterwheel.

A balanced discussion of the advantages and drawbacks of solar, wind and nuclear energy is presented as well.

Guides and literature are available for elaboration of the exhibit theme, and a selection of German souvenirs are on sale.

www.butkus.us



WELCOME
TO THE PAVILION
OF THE

Federal Republic of Germany

DR. ERNST INGENDAAY
Commissioner General



International Pavilion

United Kingdom



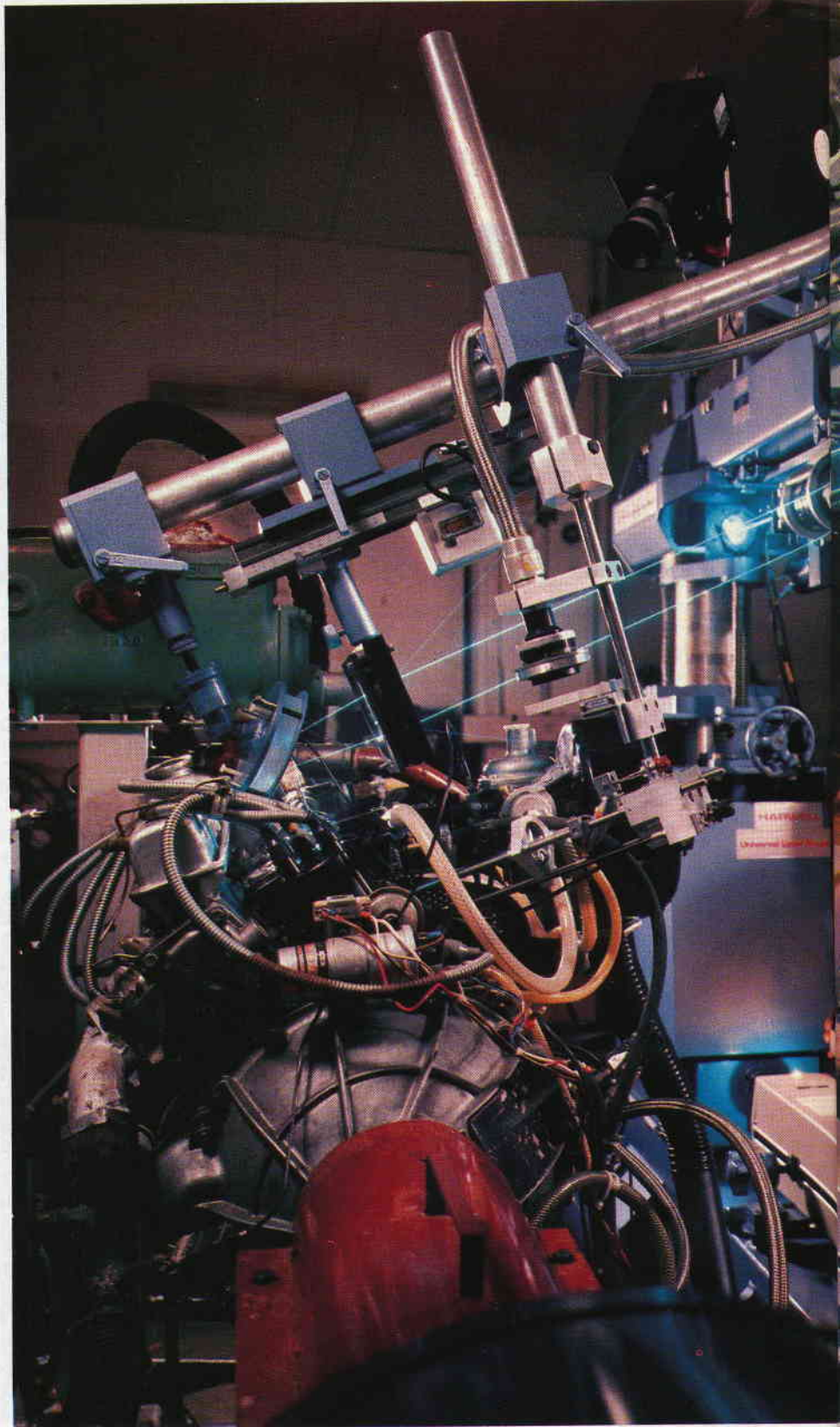
Country: United Kingdom
Language: English
Population: 55.901 million
Area: 94,209 square miles

Visitors to the United Kingdom Pavilion will see some of the most advanced energy technology in the world, and explore today's energy frontiers and sample British life in this changing energy world.

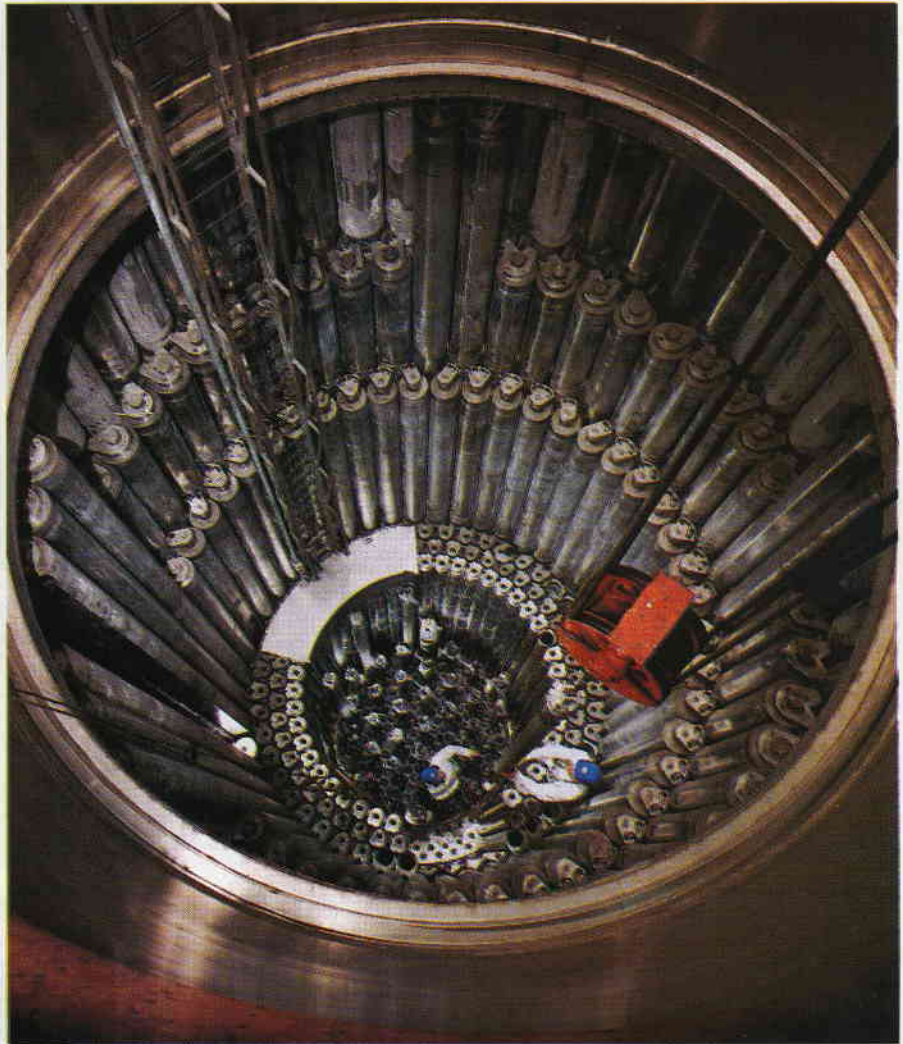
Britain has a long history of energy achievements. British scientists discovered many of the most fundamental laws of energy and pioneered the use of fossil fuels.

Now British energy expertise is at work worldwide laying the foundations for a new energy world — where oil and gas are precious commodities, where conservation is a way of life, and where some of the most unlikely sources of energy have potential.

United Kingdom's exhibit tells the story of how this energy island, built on coal and surrounded by oil, is responding to the challenge of building a new energy age. The pavilion is in the northwest portion of the Fair site.



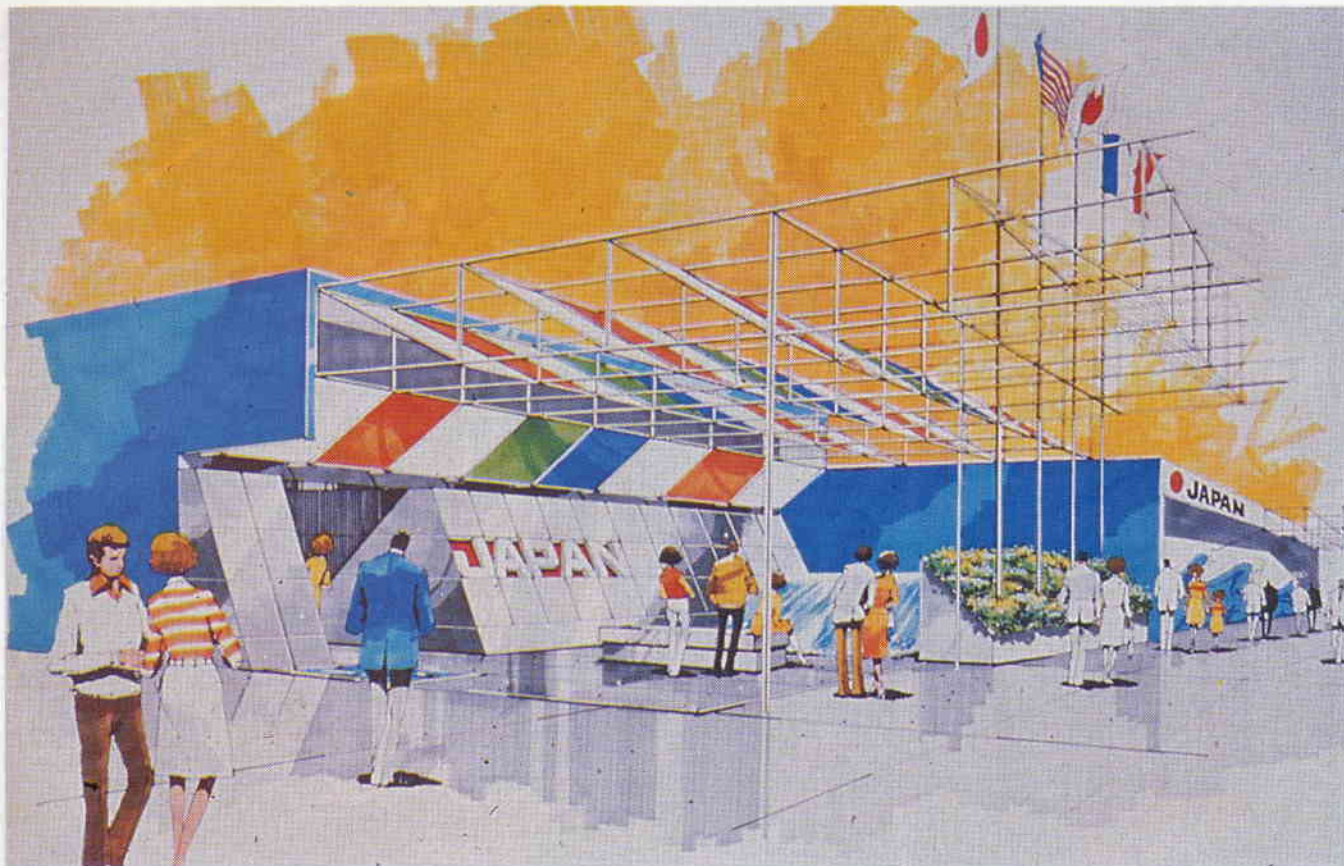
The energy answer.



www.butkus.us

International Pavilion

Japan Kingdom



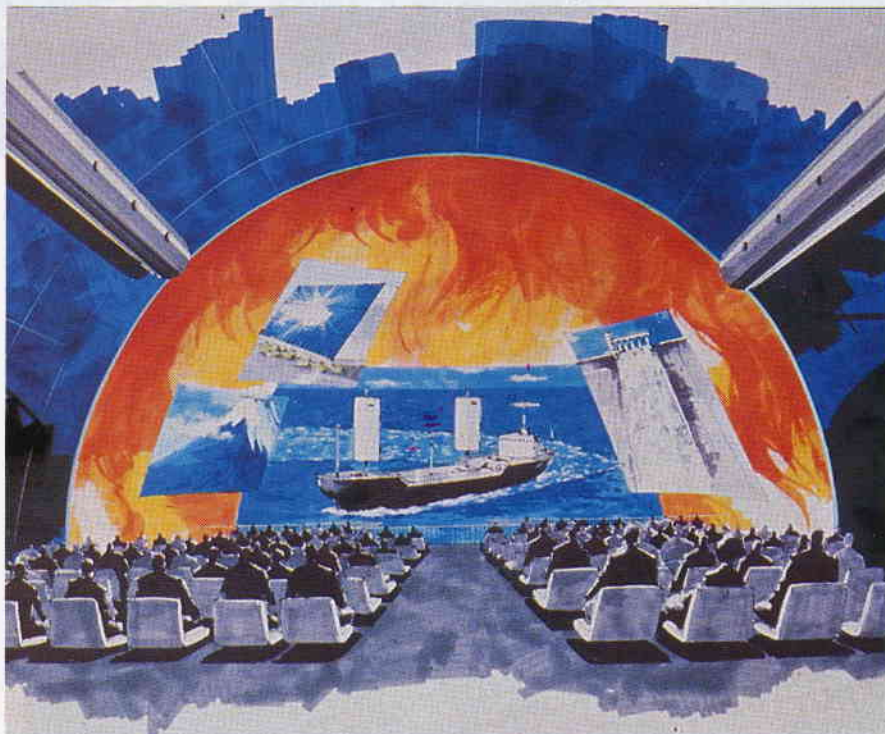
Country: Japan
Language: Japanese
Population: 116.78 million
Area: 142,726 square miles

Japan is a land of timeless beauty and traditions. It is also a land of advanced industrialization in a time of severe international energy problems.

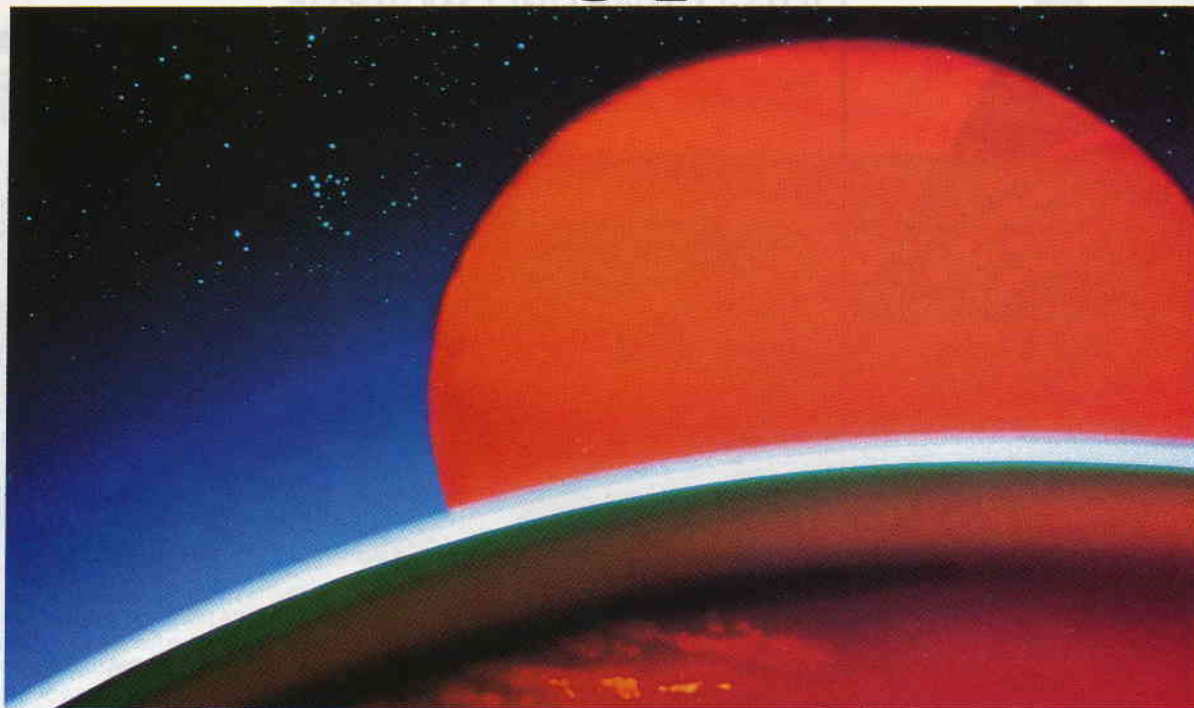
Reflected throughout the remarkable Japanese Pavilion is the statement that the energy issue is a problem that must be solved through international cooperation.

The Japanese Pavilion is divided into three zones to provide two-way communication and to build the theme climactically in a titillating and enjoyable way.

In the first zone, various aspects of Japanese society, industry and culture



The energy answer.



Find more. Fusion power, the process that makes the sun and the stars burn, with no dangerous radioactive waste and no harmful pollution, has been called the ultimate answer to the world's energy problems. Its commercial application may not be feasible until early in the next century. In the experimental fusion program by General Atomic Company in southern California, Toshiba is responsible for supplying the key elements which make this process possible.

Using natural steam from the interior of the earth to turn turbines, Toshiba makes more than half of the world's geothermal turbine generators, including those now in use in California at the Geysers, the world's largest geothermal power plant.

Use less. Saving energy is another part of the Toshiba answer. In the past ten years, for example, Toshiba has reduced power consumption of ordinary 19" color TV sets by 80%. These energy-saving sets are being produced for America in Toshiba's factory in Lebanon, Tennessee.



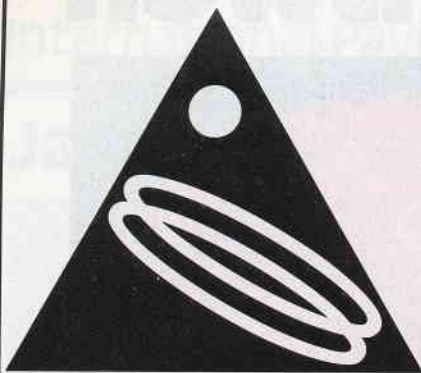
Color TV set assembly line at Toshiba's Tennessee plant.

Toshiba technology does both.

At Toshiba, with over a century of experience, more than 100,000 people are dedicated to expanding the applications of technology in electronics and energy.

TOSHIBA

...In Touch with Tomorrow



EXPO '85

TSUKUBA JAPAN

'85

17th MARCH



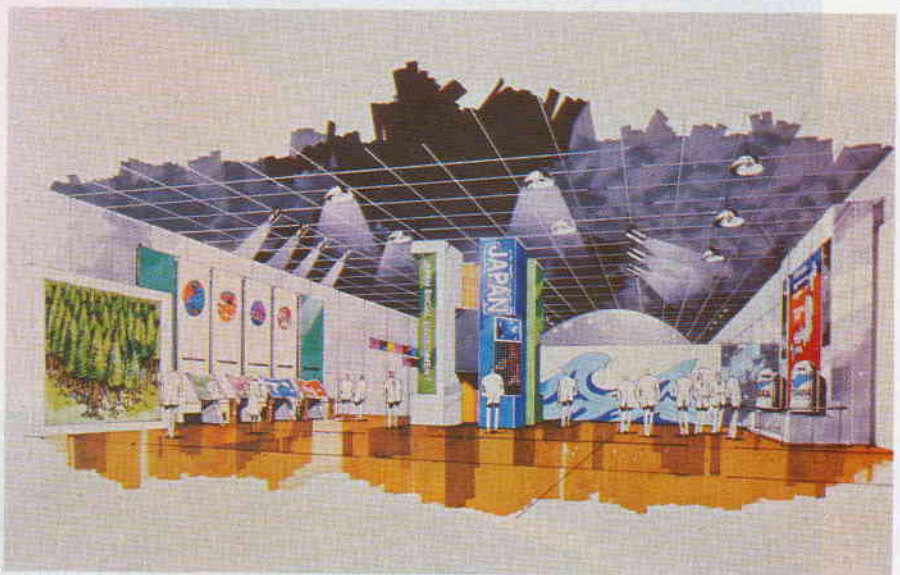
16th SEPTEMBER

Our "Energy Pavillion"
will be at the Expo '85.

We are looking into
the future, it's living, environment,
science technology
and humanity

**THE FEDERATION
ELECTRIC POWER COMPANIES
IN JAPAN**

International Pavilions



are exhibited. Visitors become aware of the high concentration of Japanese society and of the major influences caused by such concentration. Through various media, the visitor is introduced to the intricacies and

glories of Japanese nature and lifestyle.

On entering the second zone, visitors are led into a unique oval-shaped dome theater featuring a moving floor. This dynamic experience includes a special visual system which makes it possible to project the picture on a semi-spherical screen. Special sound effects also intensify the viewing experience. The aim is to bring to life for the visitor Japanese society and its concern for nature and energy conservation.

Also not to be missed are the performing industrial robots in the waiting room of the theater.

The third and last zone of the pavilion provides visitors with a participatory experience.

This zone is designed to satisfy the intellectual demands of visitors and their deepening interest in Japan and her energy situation. Here, the development of energy conservation technologies and alternative energy sources are presented by a moving model. The curious are encouraged to ask questions.

Just before departing the pavilion, visitors are treated to a tantalizing glimpse of Japan's upcoming World Exposition — Tsukuba '85.

All roads
lead
to



SHONEY'S
BIG BOY RESTAURANTS

- Breakfast •Lunch
- Dinner
- All-you-can-eat
Salad Bar
- Facilities for
private parties
- Carry-out service

9 Knoxville Area Locations:

4032 NORTH BROADWAY
5214 KINGSTON PIKE
2612 CHAPMAN HIGHWAY
5420 CLINTON HIGHWAY
RUTLEDGE PIKE
WALKER SPRINGS ROAD
ALCOA HIGHWAY
& WRIGHT RD.
401 LOVELL ROAD
4410 OAK RIDGE HIGHWAY

Australia



Country: Australia
Language: English, Aboriginal
Population: 14.62 million
Area: 2,965,368 square miles

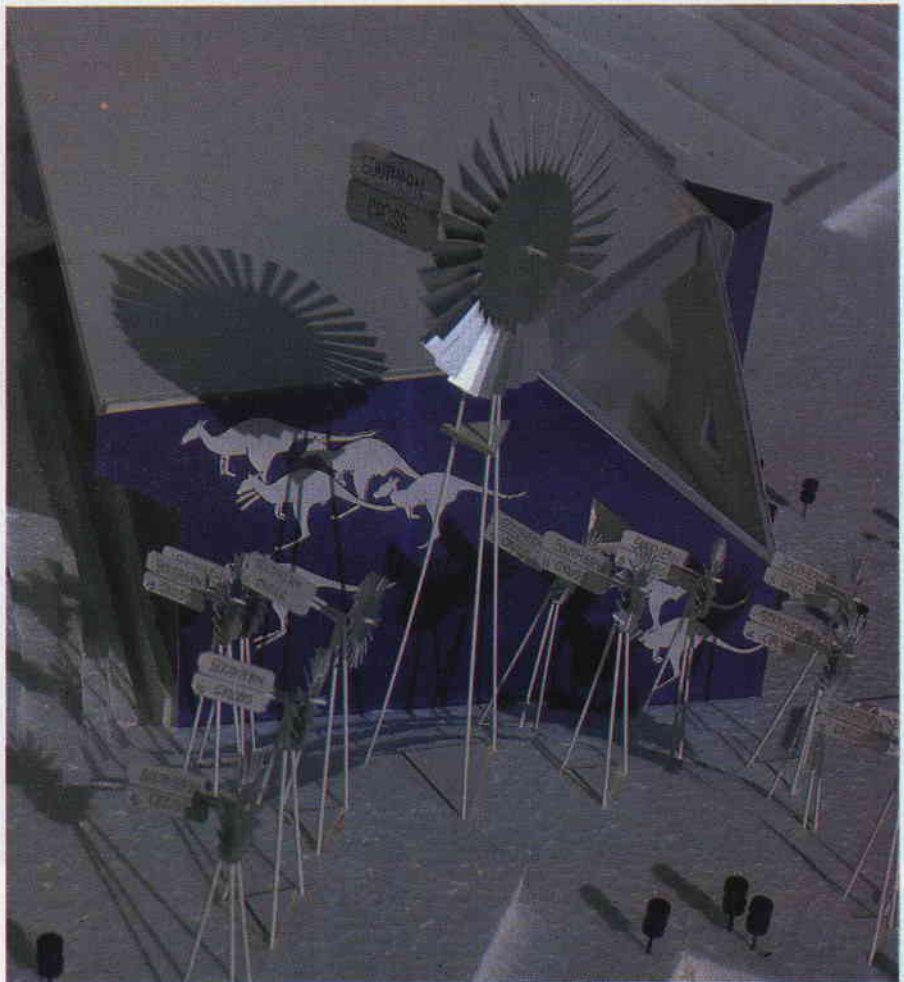
The Australian Pavilion emphasizes Australia as a stable and reliable exporter of energy with the theme "Australia — Energy down under."

On the lower level of the pavilion, the country and its lifestyle are portrayed through a sequence of spectacular static images and video monitors. Specific areas covered here include energy resources, resource development, energy technology and energy exports.

To provide an evocative image of the Australian countryside and symbolize the country's need for decentralized energy sources, an external "family of windmills" is immediately to the north and east of the pavilion. The windmills, varying in height from 25 to 75 feet, are set in an area densely landscaped with a low coverage of Australia's grevillea species.

Additional landscaping, Australian eucalyptus and tree ferns irrigated with water pumped by the windmills, are along the eastern side of the pavilion. This area also contains a solar hot water system of Australian manufacture which provides hot water to the pavilion.

The upper level of the pavilion houses a section on energy conservation — a spectacular multi-screen audio-visual program describing the physical aspects of the Australian land on screens 19 feet wide and 12 feet



high. Another area is devoted to a series of changing exhibits covering topics like: Sport, The Arts, Film, Science, Agriculture and Architecture.

In conjunction with Australia's participation in the Fair, there will be presentations around the city in wide-ranging fields of Australian artistic talent. These commence June 16, which has been designated as Australia's National Day.

The attendants stationed throughout the 8,000-square-foot pavilion are young Australians brought to Knoxville for the Fair. They are outfitted in a distinctive uniform and are available to answer visitor inquiries.

Mexico



Country: Mexico
Language: Spanish
Population: 17.91 million
Area: 761,601 square miles

Americans are not accustomed to thinking of their neighbor to the south as a major global oil producer, but that should change once they begin visiting the Mexican Pavilion.

Mexico is a country with a long history of social transformations, sometimes dramatic, with cultural

characteristics and traditions that make it singular. At present, it is working in order to achieve a harmonic development of its people that may ensure its present and future welfare.

In its territory, abundant natural resources are found, which if rationally used, may help reach the country's aims of balanced social development.

For this purpose Mexico, is availed of personnel and centers of research and education to prepare those who will have in their hands the responsibility of the country. In like manner, it has created a substructure which is in constant growth and renewal. This allows the country to develop according to the existing plans.

Mexico, a developing country, presents in its pavilion its accelerated rate of industrialization and production based on the energy resources.

Its hydrocarbon reserves are the main factor that placed the country in its present position.

As hydrocarbons represent the

highest energy consumption, the manner in which they are obtained, transformed, distributed and consumed, affects the world population as a whole. These circumstances are no longer a national issue or related to a few countries.

In the face of this situation, Mexico adopted an internationalist position and proposed a World Energy Policy as a solution to the present problems and those which will come in the future due to the use of alternative energy resources.

In the northwest portion of the Fair site, across from the pavilions of Italy and the European Economic Community, the Mexican Pavilion contains several examples of the nation's emerging energy production and research industries. Chief among these is an unusually simulated pool of oil.

The pavilion also gives visitors from around the world a chance to sample authentic Mexican dishes. The restaurant, staffed by *senoritas* and *caballeros*, sells assorted native Mexican handicrafts, too.

Royal Kingdom of Saudi Arabia



Country: Royal Kingdom of Saudi Arabia

Language: Arabic

Population: 9.292 million

Area: 873,000 square miles

"Eternal Values in a Dynamic Nation," the theme of the Saudi Arabian Pavilion, reflects both the continuity and development of Arab civilization.

Young Saudis dressed in native garb guide visitors through the pavilion, which is easily recognized by its surrounding arches. Exhibit areas include Islam; Bedouin Tradition and the Cradle of Civilization; Industrial Development; Human Resources, and 50 Years of U.S.-Saudi Relations.

From the prophet Abraham and his son Ismael, the Arabs and a distinct Arabian civilization can be dated from 3,500 B.C. Ancient Arab cities were important commercial and cultural

centers along the trade routes that extended from Rome to Persia, and gave birth to an empire in the 7th century.

Stimulated by the spiritual, moral and intellectual power of Islam and its prophet Muhammad, the Arab people spread their civilization, language and religion around the world. Currently, Saudi Arabia's lightning-paced industrial and human development signals its re-emergence as an important influence in world political and economic affairs.

Here is a closer look at these specific areas of the Saudi Arabian exhibit.

Islam

The centerpiece of the Saudi Arabian Pavilion is a 400-square-foot display featuring an animated model of the Grand Mosque of Mecca. It symbolizes the centrality of Islam in Saudi Arabian life and historical experience. The Kaaba, a black cube-shaped building around which the mosque is built, is the focal point of the prayers of the world's 800 million Muslims and center for yearly

pilgrimage.

Traditional society

A second area of the pavilion focuses on the history of pre-Islamic Arabia, as well as the traditions and values of the Bedouin tribes of the Arabian desert. The Bedouin's life-and-death struggle to survive in a harsh environment is given expression by his fierceness in combat — but also by his philosophical and aesthetic appreciation of life. This is reflected in various art forms, particularly the medium of poetry.

U.S.-Saudi relations

U.S. technology and experience have figured largely in Saudi development, as highlighted in the final exhibit area, U.S.-Saudi Relations. Cooperation and friendship, based on strong commercial and financial ties, have characterized dealings between the two nations. In a part of the world that is politically and geographically strategic, Saudi Arabia's interests coincide with those of the United States in ensuring political moderation and stability in the region.

International Pavilion

Republic of Korea



Country: Republic of Korea
Languages: Korean
Population: 38.197 million
Area: 86,000 square miles

During the past 20 years, Korea has achieved remarkable progress by continuing its ceaseless efforts to modernize its economy. By participating in The 1982 World's Fair, Korea is intent upon publicizing the Korea of today, a land with a bright new horizon.

Constructed on a hill, this beautiful

hexagonal pavilion provides a symbolic attraction and place for relaxation. Adjacent to this structure, a shimmering pond with its impressive waterwheel represents the importance of hydraulic energy to the Korean people.

The design of the Korean Pavilion is such that the interior is broken down into zones presenting "the past," "the present," and "the future."

A highlight of Korea's exhibit is "Ondol," a hot-floor heating system used since the prehistoric age which has proved to be an effective cooking method as well. The ondol's structural aspects and the creativeness of its related techniques is stressed along with the Korean lifestyle.

A seven-minute multi-image production presents a panorama of the cultural, industrial and economic development of Korea, enabling visitors to gain the broadest possible perspective of the country by means

of a visually-striking medium.

Twice daily, visitors are given an extra-special treat when traditional Korean folk dancers bring the beauty and pageantry of Korea to life. The swirl of bright colors and the vibrant sounds of exotic musical instruments are sure to fascinate audiences.

There is a special "hands-on" experience for visitors, too, in the form of a Hangeul (Korean alphabet) word processor and printer. Still more fun is available at the fortune-telling machine.

A Korean restaurant serves traditional Korean food throughout the day, and a sales corner offers visitors many native products. Unique Korean fans, guide booklets, and badges will be distributed to visitors as souvenirs of their visit to the Korean Pavilion.

During Korea Week (May 17-25) a multitude of events are scheduled such as folk dances, sporting events, a commemorative parade, Korean traditional musical performances, and Tae Kwon Do demonstrations.

Commemorative pictures, postage stamps and art exhibits marking the centennial anniversary of Korea-U.S. relations are planned as well.

FIND KOREA JUST BESIDES YOU



THE '82 WORLD'S FAIR!
VISITING THE "NEW HORIZON IN KOREA"
WILL BE A GREAT EXPERIENCE FOR YOU.

YOU WILL MEET THE ENERGY WORLD OF KOREA
AT THE '82 WORLD'S FAIR IN KNOXVILLE.

KOREA PAVILION

www.butkus.us

International Pavilion

Canada



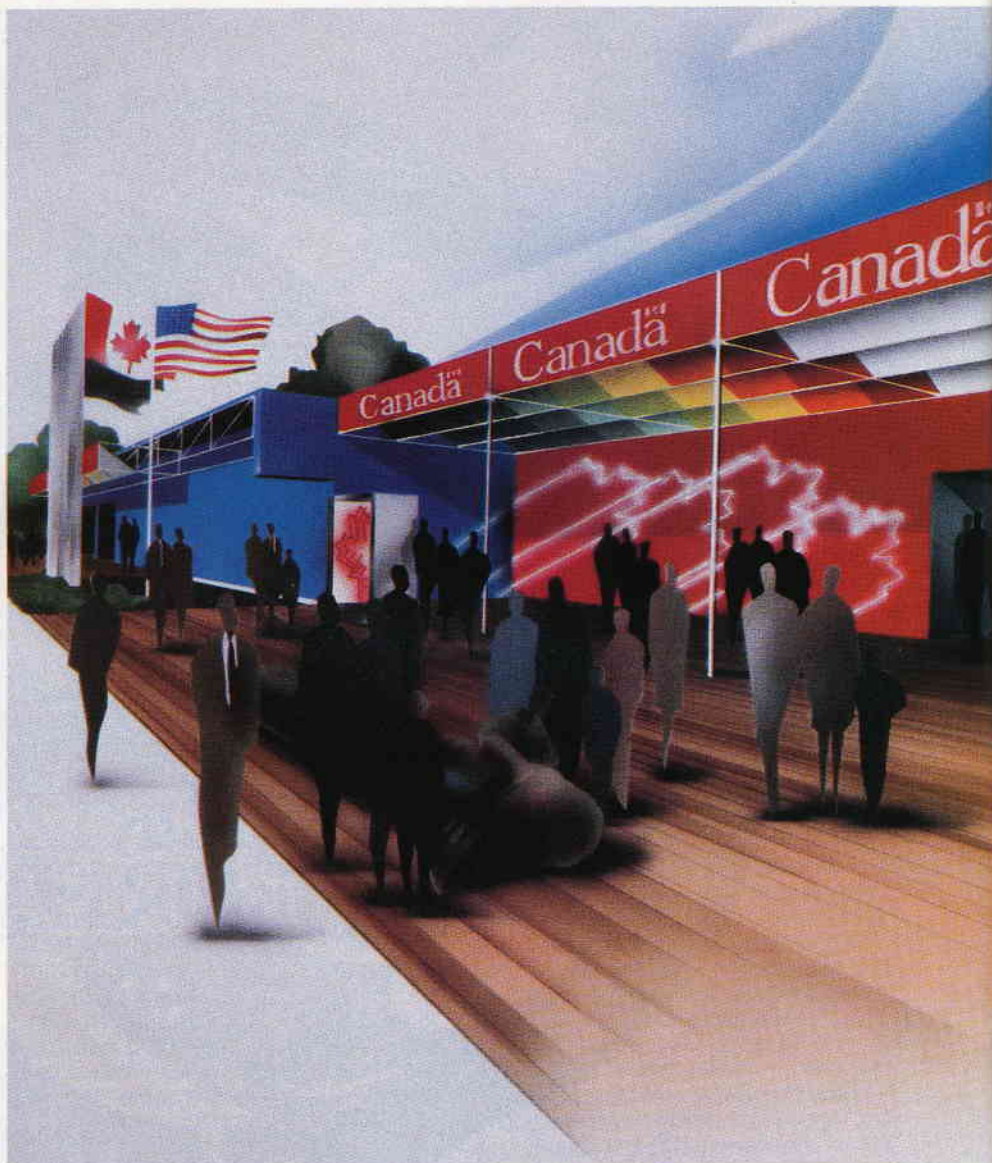
Country: Canada
Language: English and French
Population: 24,105,163
Area: 3,851,809 square miles

Visitors approaching the Canadian Pavilion will notice a courtyard of banners, representative of the changing seasonal colors of Canada's symbol, the maple leaf. The maple leaf is also the basis for the pavilion logo echoed in neon sculptures on the entry deck.

The pavilion introduces the challenges faced by Canadians in attempting to secure their energy future. Exhibits have been grouped into two areas divided by a cinema. The first area introduces visitors to the "megaprojects" of Canadian energy development, while the cinema provides a humorous interlude and transition to the second exhibit area where energy matters have been reduced to the human scale.

The megaprojects of Canada are faced with extremes of ice, cold and rugged terrain which challenge Canadians and their technology. The sources of Canadian energy are displayed on a dramatic, computerized neon map, while an adjacent Telidon videotex unit gives visitors hands-on access to in-depth energy information. The oil sands and Arctic Beaufront Sea and Hibernia oil and gas projects are also shown, along with vast hydroelectric developments and regenerative nuclear technologies.

Once extracted and generated, these forms of energy require efficient and economical transportation across Canada's 3.8 million square miles. This process is depicted in an unusual and visually exciting "theme wall" showing hydroelectric transmission, pipelines, power grids, rail



and shipping facilities and energy-efficient modes of transportation.

The cinema presents an animated view of energy consumption and conservation starring Nelson Permafrost and his trusty dog Rollo, along with Dr. Now and his sidekick, Felix.

In the third area of the pavilion, the story of Canada's search for alternative energy sources unfolds as visitors watch a working 22-foot model of the world's largest wind turbine.

Since North Americans are seeking ways to improve energy efficiency in homes and cars, two special exhibits — "The House" and "The Car" — as

well as computerized, hands-on areas, will explain new techniques and answer many questions.

A comprehensive Information and Resource Center will complete the tour of the Canadian Pavilion. Here visitors may select reference material on energy and conservation subjects that interest them. Those seeking more advanced and specialized knowledge can make use of the resource center's Telidon, videotapes, films and special documentaries.

The Canadian Pavilion at The 1982 World's Fair is presented by the government of Canada in cooperation with the provinces of Alberta, British Columbia, Ontario and Saskatchewan.

International Pavilion

Hungarian People's Republic



Country: Hungarian People's Republic
Language: Hungarian (Magyar)
Population: 10.71 million
Area: 35,919 square miles

Great ideas know no boundaries. A prime example of this is the world-famous Rubik's cube, a masterpiece of clever but maddening ingenuity.

Having dispensed fun and frustration among people everywhere, this puzzle-lover's dream is the centerpiece of the Hungarian Pavilion, the cube's country of origin.

As visitors approach the pavilion's colorful facade, their eyes will be immediately drawn to a large, transparent Rubik's cube at its center. Seated in the cube's interior is a Husser — or Hungarian cavalier — who makes an imposing picture as he cradles The 1982 World's Fair flame in his hand.

The Hungarian People's Republic wants to present to the world a view of the Hungary that has contributed immeasurably to the development of human culture. It also wants to show a Hungary whose up-to-date technical standards are ready for expansion into foreign markets.

The first section of the pavilion offers visitors a glimpse of the many famous Hungarian artists and scientists who have distinguished themselves throughout history.

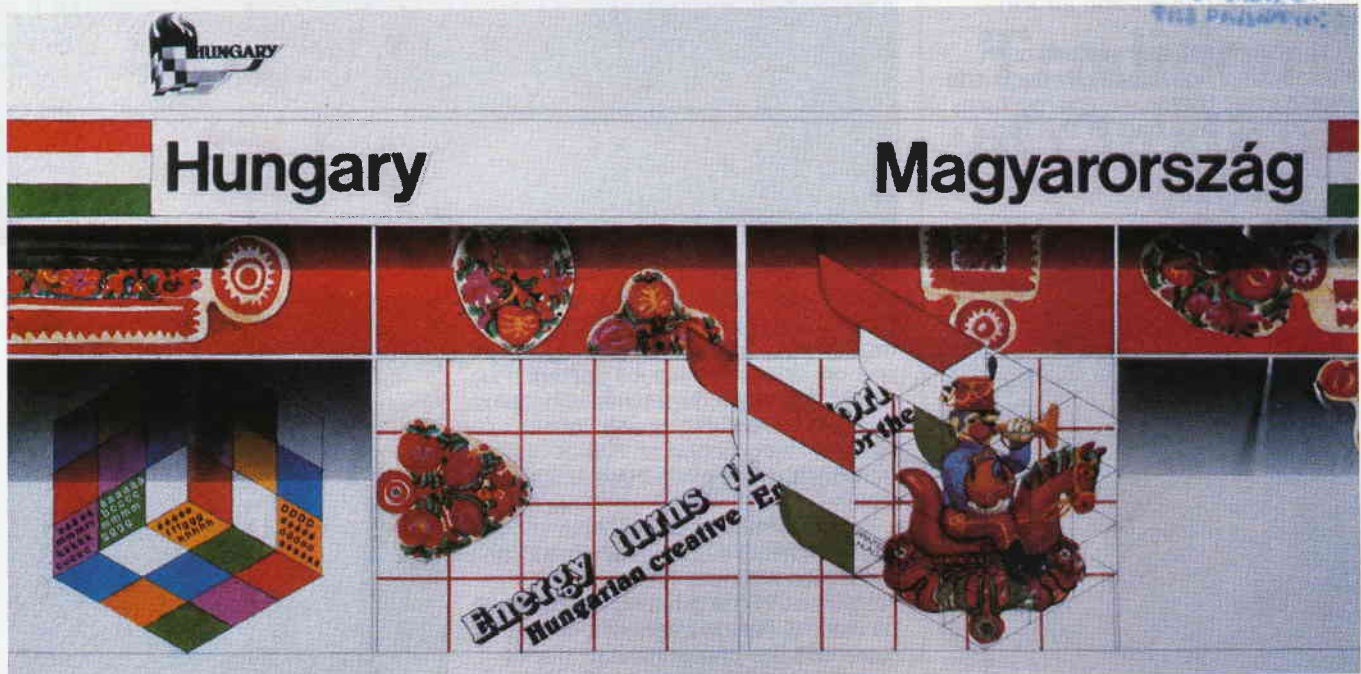
Through original documents and photos, such fascinating people as Todor Karman (the father of supersonic flight) and Jamos Irinyi (inventor of the match) are introduced and old friends like Liszt and Bartok are revisited.

A second section of the pavilion concentrates on the Hungarian energy industry. Here, a panorama of technology is presented, including a mock-up of the "Gagarin" thermal power station, a model of "Thorez" surface mining, and energy-saving ideas used in agriculture.

A third section of the pavilion is given over to an authentic Hungarian restaurant with seating for 65. The menu includes such treats as goulash, cabbage rolls, palachinta and strudels.

Of special interest to fair visitors are the cube contests that involve the participation of cube inventor Erno Rubick. Also present is a native folklorist who gives demonstrations of his art.

MAGYARORSZÁG
WORLD'S FAIR - 1982
KNOXVILLE, TN
HUNGARY



International Pavilion

Peoples Republic of China



Country: People's Republic of China
Language: Mandarin Chinese
Population: 1.027 billion
Area: 3.691 million square miles

Spectacular is the only word to describe the People's Republic of China Pavilion.

The government of China, which considers this to be China's first world's fair participation ever, regards this pavilion as an unprecedented opportunity to establish a cultural dialogue between the people of China and the world.

While reflecting China's exciting developments in energy, industry, consumer products and the arts, the exhibit centers on China's rich history and its most valuable natural resource — the Chinese people.

Forty representatives from the People's Republic of China are on staff at the pavilion. Representing a broad cross section of Chinese life, they are there to both greet and inform visitors.

The theme of this exhibit, both literally and figuratively, reflects the World's Fair theme — "Energy Turns The World." As a part of this focus a solar-powered dragonboat, 20 feet long and 6 feet wide, is offered for trips up and down the river. Elsewhere outside the pavilion, a giant tank produces and collects propane gas made from local marsh gases.

One of the highlights of the exhibit is an actual portion of the Great Wall of China on display inside the pavilion, affording visitors a rare glimpse of one of the world's original Seven Wonders.

Photographic studies of the Chinese at work, at home and at play will greet visitors upon entering, leaving Westerners the feeling that they have a great deal in common with their Chinese counterparts.

The energy and genius of the Chinese people is well represented at the exhibit where artifacts of ancient splendor rest alongside a wealth of exotic contemporary wares, objects d'art and everyday items.

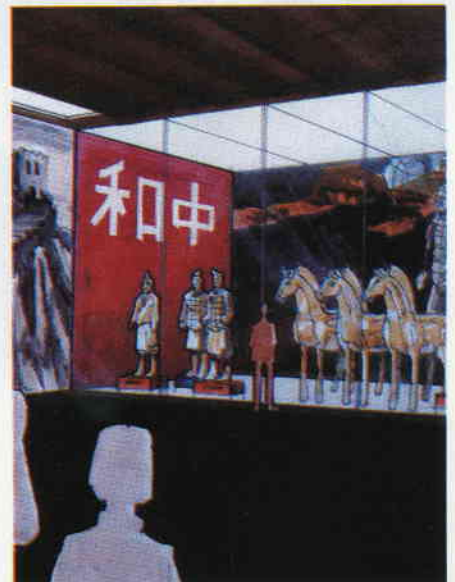
Visitors can wander among



thousands of square feet of soapstone carvings, glazed glass, jade carvings, modern and antique porcelain, rattan and silk goods, miniature potted plants, furniture, tapestries and items fashioned from pearls and clams. Here, visitors can watch live demonstrations by Chinese artisans as well.

Gastronomically, the Chinese pavilion offers a unique opportunity for Western diners. A sit-down restaurant in the building is operated by leading Peking chefs who will supervise the preparation of dishes usually not available to Americans. There is also a cafeteria-style annex for visitors with less time to spare.

A crowning touch to this wealth of wonders is entertainment. Leading artists from China will perform throughout the summer for the enjoyment of exhibition visitors.



Republic of Panama



Country: Republic of Panama
Language: Spanish
Population: 1.25 million
Area: 29,208 square miles

The Panama Canal, its importance and future, highlights the Republic of Panama Pavilion.

Few things have played such an important role in promoting energy conservation in the shipping industry as the Panama Canal. This manmade waterway has created a 78-year bond of friendship and cooperation with the United States and other countries.

The exhibit also features original art representative of Panama's culture and lifestyle.

Panama was the 20th country to commit to participate in The 1982 World's Fair.

Republic of the Philippines



Country: Republic of the Philippines
Language: Visayan, Tagalog, Ilokano
Population: 37 million
Area: 115,707 square miles

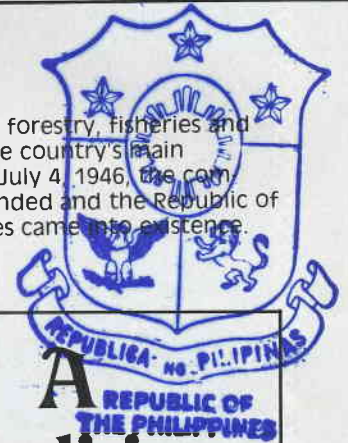
One of the last international pavilions to be contracted for The

1982 World's Fair is the Republic of the Philippines.

Made famous during World War II, the Philippines is now a rapidly industrializing nation, devoted to the manufacture and processing of agricultural products.

Energy and energy conservation are major factors in the national environment today as in the past when the government participated directly in construction of hydroelectric plants.

Agriculture, forestry, fisheries and mining are the country's main products. On July 4, 1946, the commonwealth ended and the Republic of the Philippines came into existence.



A REPUBLIC OF THE PHILIPPINES Tradition of Quality



The Official Coffee of
THE 1982 WORLD'S FAIR™

Egypt



Country: Egypt
Language: Arabic
Population: 38.9 million
Area: 386,100 square miles

Egypt, a country rich in tradition, mythology and biblical history, is represented at The 1982 World's Fair with an exhibit of treasures from its earliest civilization through modern days.

The exhibit, on the south end of the fairgrounds in the same building as

the Republic of China Pavilion, includes treasures from the pharonic dynasties, the Greco-Roman period, Egyptian Christian era, the Islamic age and modern Egypt. It may be more culturally meaningful than the King Tutankhamen exhibition that visited six U.S. cities several years ago.

The exhibit is the first of its kind in the United States in modern times. Egypt, under the late President Anwar Sadat, its future and items from the era of Pharaoh Ramses II — as well as the period Mary and Joseph spent in the country — are highlights.

The 1982 World's Fair executives believe this exhibit will have a similar impact as the King Tut display of 1977.

WORLD'S FARE.

No fare in the world compares to Mexican food. And no Mexican food compares to ours. So, after spending the day walking from country to country, spend the evening relaxing in Mexico.

CASA GALLARDO[®]
MEXICAN RESTAURANT
& BAR

NOTHING BETTER NORTH OF THE BORDER.

Knoxville, Tennessee

6515 Kingston Pike
588-9751

Mon.-Thurs. 11:30 A.M.-11:00 P.M.
Fri.-Sat. 11:30 A.M.-12:00 P.M.
Sun. 11:00 A.M.-10:00 P.M.

Nashville, Tennessee

24 White Bridge Road
356-3165

Mon.-Thurs. 11:00 A.M.-11:00 P.M.
Fri.-Sat. 11:00 A.M.-12:00 P.M.
Sun. 11:00 A.M.-10:00 P.M.





In Quest of Energy... Domestic Pavilions

www.bulkus.us

Mayor, City of Knoxville

Randy Tyree



Welcome to Knoxville, Tennessee and The 1982 World's Fair. We're glad to have you here and hope you have an enjoyable visit. We hope you are making plans to visit us often during and after the Fair.

This is the first world's fair ever staged in the Southeastern United States and Knoxville is proud to be the host. We think you will like what you see here. Our citizens are some of the friendliest people you will ever meet. Please take time to see what we have to offer.

The city of Knoxville offers a wide variety of cultural amenities and the traditional East Tennessee hospitality is second to none. With the world coming to visit in 1982, Knoxville is truly the place to be.

We're glad you're a part of The 1982 World's Fair. Thanks for joining us.

A stylized, handwritten signature of Randy Tyree in black ink.

Randy Tyree
Mayor, City of Knoxville

An advertisement for Cato featuring five female models in various fashion outfits. The background is blue with a large red circular graphic. The Cato logo is in the top right corner. The models are wearing a variety of styles including sweaters, blouses, jackets, and dresses. One model is wearing a blue and white striped dress, another is wearing a green top and green pants, and another is wearing a light-colored suit. The models are posed in a way that suggests a fashion show or a catalog display.

CATO[®]

Cato, the southeast's leading women's fashion apparel chain, offers you great fashions at truly affordable prices. At Cato you will find the very latest in beautiful up-to-the-minute fashions and accessories in junior, missy and large sizes.

Check out our casual and dressy styles at money saving prices at any one of our 350 stores.

In the Knoxville area you will find 11 convenient Cato locations to serve you.

- 120 E. Bruce St. Sevierville, Tenn.
- 204 N. Market St. Dayton, Tenn.
- E. Broadway St. Newport, Tenn.
- 134 Depot St. Greenville, Tenn.
- 104 E. Central LaFollette, Tenn.
- 541 Elk Ave. Elizabethton, Tenn.
- College Plaza Harriman, Tenn.
- 800 Cumberland Sq. Crossville, Tenn.
- 726 Tennessee Ave. Etowah, Tenn.
- 340-342 Market St. Clinton, Tenn.
- Midland S.C. Alcoa, Tenn.

CATO

World's Fair Special 10% Discount

Present this coupon at any Cato store and receive 10% off Cato's already affordable prices.

Valid May 1982 through October 1982.

Domestic Pavilion

City of Knoxville



Knoxville's Health Pavilion, sponsored by the host city of The 1982 World's Fair, provides an environment where health and well-being are the major concerns.

As visitors enter the comfort-controlled, vinyl-clad dome supported by a geodisic-patterned metal frame, they begin an experience that may affect the remainder of their lives.

Visitors have their choice of circling the many exhibits or walking straight ahead where they will encounter Hospital Corp. of America's "Health Care Pyramid." This spectacular anchor exhibit occupies 1,500 square feet and features a multimedia show embodying an entirely new concept. Pictures, words and music come from every angle on four hexagonal screens, presenting the history of health care in this nation and what it means to individuals in the future.

Visitors can also converse with five interactive computers, one of which is especially designed for children, armed with multitude of facts related to their personal health. By punching in a few vital statistics, individuals learn their life expectancy. If they have a chronic illness, they can find out from the computer if they're taking proper care of themselves, based on a huge bank of data about people in the same condition.

Satisfied that they now have some important information tucked away, visitors can walk over to the Fort Sanders Medical Center/Datamation exhibit. Here they'll find out how to take a week off and slip away to a delightful "wellness" center. Then they can slip into a comfortable chair and rest while they are encompassed in a cuff that automatically takes their blood pressure and prints the results before their eyes.

Medical technicians, there for the sole purpose of informing and advising visitors, will be happy to answer any questions. If interested in a total health profile, forms can be picked up and mailed to Datamation from home. Results will be returned promptly.

Another "must-see" exhibit is the Southeastern Organ Procurement Foundation/American Kidney Fund



display where individuals can leave a bit of themselves behind so that someone else may enjoy life and also bring themselves up-to-date on the technology concerning organ transplants.

Other experiences include Motorola's story on telemetry equipment (used by paramedics to relay vital data on ill and injured patients to doctors in hospitals) to be

viewed in the multi-unit Video-Disc Theater, along with other corporate participants.

Community and Economic Development will have a exhibit where visitors will also be able to learn about redevelopment of "slum" areas and how changes in environment can affect the lives and health of persons within those areas.

Domestic Pavilion

Gas Energy Exhibit

Rising dramatically skyward, a 55-foot blue and silver pyramid encompasses the 5,000-square-foot Gas Energy Pavilion.

In the past, the pyramid was the ancient Egyptian symbol of a sunburst, the original source of almost all energy. The lightweight, sleek form of the pyramid-shaped space frame represents the future through its use of the latest high technology as well.

Inside is the natural gas industry exhibit — 3,000 square feet of sophisticated, audience-participation exhibit technology that details in an educational and highly interesting manner, all phases of gas energy.

The exhibit is open for public viewing from 10 a.m. to 10 p.m., seven days a week. An added attraction is a live energy show "GasWorks: Pipeline to the Future," developed by the Oak Ridge Associated Universities under a grant from the American Gas Association and presented courtesy of the Tennessee Gas Association. The show is featured throughout the day directly outside of the Gas Energy Pavilion.

America's largest domestically-produced energy is natural gas. It's also our cleanest and most efficient. To tell the story of natural gas — its role today and its future promise — the Gas Energy Pavilion will feature an array of state-of-the-art audience participation exhibits.

Sources of Gas Energy

Gas energy is a natural resource available from a wide variety of sources. The multiplicity of gas energy sources and their availability to the consumer through an integrated delivery network is a story of paramount importance. To guarantee visitor attention to this story, one of the largest energy dioramas in museum use recreates a vast topographic landscape in miniature three-dimensional form.

Gas Strike

The primary function of this exhibit is to identify the aspects of gas exploration and production, and to focus on the costs and risks involved. Related displays show the relationship between gas and oil drilling, and technologies. To convey these messages, a 35-foot drilling rig is set in place at the center of the pavilion.

Surrounding the rig is a series of electronic video games on which



visitors can simulate exploring and drilling for natural gas.

The Flame and Energy Efficiency

The blue flame is the visible end-product of the most efficient and cleanest fuel we have — the trademark of the gas energy industry. To dramatically represent just how much energy that blue flame accounts for each minute, a specially-designed chamber allows visitors to study the properties of a flame. A surrounding display of computer-precise "energy time clocks" tracks minute by minute, season by season, the exact amounts of energy provided by the blue gas flame.

In the Pipeline

The million mile gas energy pipeline is an invaluable energy asset deserving of particular attention. To draw that attention, an over-sized portion of the pipeline system is reproduced. Visitors are able to walk into the middle of this pipeline and be surrounded by a startling visual display. The "gas" in this system is in the form of brightly-colored laser lights that activate audio messages briefly stating pertinent facts about

the pipeline system.

Role of Gas

Gas is the largest single source of energy for meeting America's residential, commercial and industrial needs. Because of its benefits, nearly 180 million Americans rely upon the direct use of gas for meeting some part of their individual energy needs. The lives of all Americans are touched by gas energy because somewhere in the production of almost everything we use, and almost everything we eat, gas energy plays a role. This fact is emphasized dramatically in the exhibit by a large crystalline case filled with objects we use that rely upon gas.

The Future

The role of gas in the future is rich with potential. To help us peer into this energy future, and to link it with the opening display, holograms are again used in the exhibit. These holograms are mounted on a series of glass pylons and center on present and anticipated advances in appliance and equipment technology, natural gas-powered vehicles, and future sources of gas.

Baptist Ministries

In the shadow of a 40-foot carillon tower in the center of the Fair is the Southern Baptist Pavilion, operated by Baptist Ministries.

The 3,500-square-foot structure features a theater and display area to show fairgoers that "The Word is...Energy." This 30-minute program illustrating the energy of God's word, includes a multi-image presentation and a live musical, offered daily from 10 a.m. to 10 p.m. Performances by choirs from across the United States are also scheduled on most days.

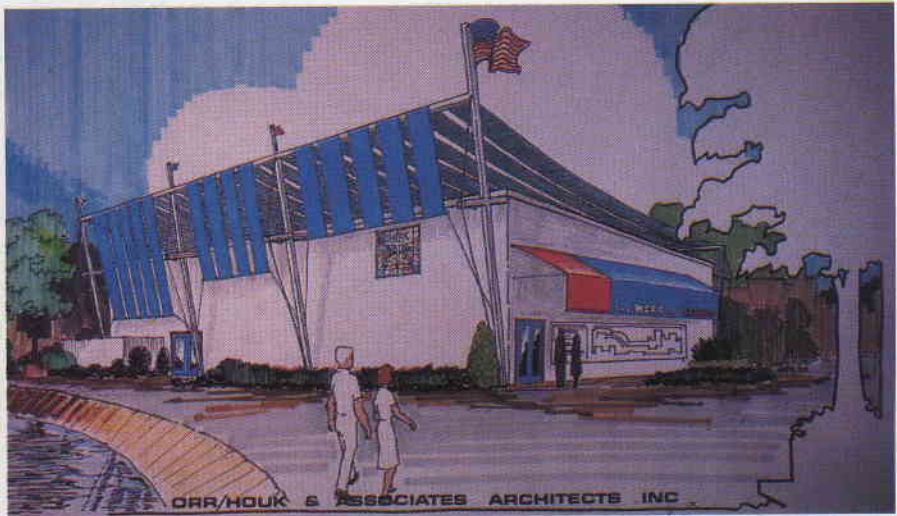
The musical, "Love, You Spoke A Word," is written by Ken Medema of San Francisco and Craig McNair Wilson of New York City. Medema is a blind Southern Baptist composer and entertainer. Wilson is a Christian entertainer and writer. The performing group, PowerSource, is comprised of 16 singers chosen from auditions conducted across the nation.

A highlight of the exhibit area is an antique display case holding Bibles of America's first Bible publisher, A.J. Holman & Co. The case, on loan from the Philadelphia Museum of Art, received the First Premium Award at The 1876 Philadelphia International Exhibition. Scriptures in some 50 languages will be among materials distributed at the pavilion.

The solar-powered carillon, provided by Schulmerich Carillon, Inc. of Sellersville, Pa., is an interesting exhibit in itself. Visitors can actually see some of the mechanical operation of this musical instrument at the base of the tower.

The pavilion is topped by a canvas canopy featuring a design of the Christian flag. Its stained-glass window, made by Jess Bemis, a Southern Baptist pastor from Greentown, Ind., features the logo of the Southern Baptist Convention.

This national fellowship is composed of 14 million members in nearly 36,000 churches in 50 states. It is represented in 95 countries by persons working in evangelism and church growth, theological education, hospital, schools, publication centers, agricultural projects, social work, hunger and disaster relief, benevolent

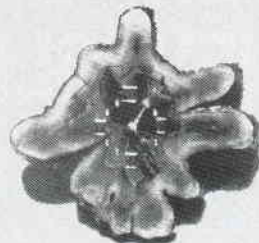


ministries and student ministries.

The Knox County Association of Baptists, the Tennessee Baptist Convention and agencies of the Southern

Baptist Convention have provided the financial and program support for visitors to The 1982 World's Fair to experience "The Word Is...Energy."

Beautiful top quality CYPRESS CLOCKS



only **\$19.95**
(plus postage & handling)
16" to 20" dia.

features include:

- HI Gloss Resin Finish
- Accurate precision set Quartz movement with full 5 year warranty
- Hand finished Natural-shaped cypress
- Gold plated hands & numerals

Send check or money order today!

To: Cypress Limited II
P.O. Box 22141
Lake Buena Vista, FL 32830

Please send me ___ clock(s) at \$19.95 each,
plus \$3.00 postage & handling per clock.

Name _____

Address _____

City _____ State _____ Zip _____

Charge to: Visa or MasterCard # _____

Signature _____ Exp. Date _____

Allow 4-8 weeks delivery; Fla. residents add 4% Sales Tax; (USA orders only); Operates on one "C" battery, not included; some assembly required

www.butkus.us

Kern's makes the world a little batter.



Kern's
The Official Bakery
of the 1982
World's Fair.

Domestic Pavilion

American Electric Energy Exhibit

The theme of America's Electric Energy Exhibit (AEEE) is "Electric Energy — Key to a Better Future." The AEEE Pavilion features exhibits by various segments of the electric power industry, including power producers, equipment suppliers and appliance manufacturers. It also houses futuristic exhibitry, displays of products and services consumers can use today, and other developments for home, office and industry that will be part of American life in the future.

The pavilion focuses on ways utilities are working to meet the need for increased amounts of electricity as the economy expands in the years ahead. The centerpiece of the AEEE pavilion is an exhibit describing the Clinch River Breeder Reactor Plant Project, planned for construction at nearby Oak Ridge, Tenn.

Sponsored by Breeder Reactor Corp., a non-profit group of 753 utilities nationwide, this exhibit features a model of the plant and a description of the way in which a breeder generates electric power while producing more fuel than it consumes.

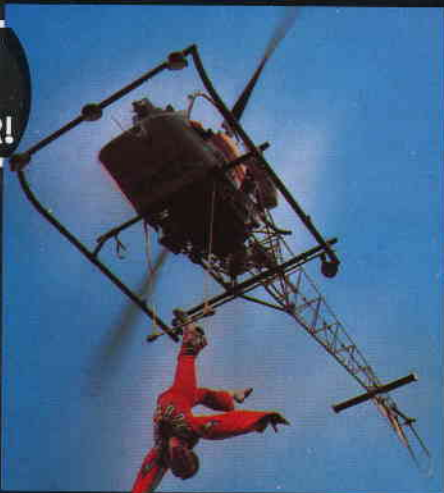
The AEEE Theatre features a regularly-scheduled audio-visual presentation about electricity. The electrifying "Up With People" show, sponsored by General Electric, will also appear regularly in the theater.

AEEE is a non-profit corporation of associations and businesses in the electrical energy industry.



SEE THE BELIEVABLE AT EXPO...
THEN SEE THE **UNBELIEVABLE!**

**NBC-TV
CALLS IT
SPECTACULAR!**



Just minutes from Expo is a two hour experience that may well be the most amazing of your life. International circus stars and champion stunt and show water skiers perform devilish and death defying feats that will have you rolling with laughter or holding on to the edge of your seat. Groups, families, or individuals will love this two hour, live spectacular on water, stage, and in the air!

TOMMY BARTLETT'S
Water Circus

FOR INFORMATION:

Call or write:
(615) 453-9473
In Knoxville
(615) 637-6599
or
P.O. Box 58
Pigeon Forge,
Tennessee
37863

FORGE VALLEY FUN PARK

**Bigger and better
than ever for 1982!**

- A MUST attraction after your World's Fair Visit
- Unique animal park - touch, pet, and feed our exotic, miniature, and baby animals
- Picnic facilities and food on premises
- Mountain entertainment on weekends
- Water-powered grist mill and whole grain bakery
- General Store, Mountain Crafts and Pottery Shops
- New gallery of electronic digital games

• Open May 9 through October, 10-6 daily, convenient to Asheville and Hendersonville, N.C.

- just a short drive from Knoxville.



FORGE VALLEY FUN PARK
Hwy. 290-Box 164-B-Horse Shoe, N.C. 28742
Ph. (704) 891-3134 or (704) 891-3241

"The Coupe."

In Bavaria, we weren't surprised to hear *Road & Track* named it "best sports coupe for the 80s."



Audi Coupe 5-speed \$12,370 suggested retail price, P.O.E. Add transp., local taxes, dealer delivery charges. Photographed in Kastl, West Germany ©1982 Porsche Audi.



For many cars, such lavish praise might be impossible to live up to. But not for this car.

The Audi Coupe is, clearly, the quintessential Gran Turismo Sports Coupe.

In naming it the best sports coupe for the 80s, the editors of *Road & Track* are not alone. *Motor Trend*: "... we'd have to call it the most ferociously desirable new car in 1981."

Car and Driver: The Coupe is "... one of the most effective remedies yet, for

creeping four-door boredom."

From the drawing boards in Ingolstadt, Bavaria, Audi engineers have created a car that truly advances the art of GT Coupes.

In sleek, good looks and aerodynamics, it is second to none. In engineering, the Coupe offers Audi's matchless front-wheel drive, five-cylinder powerplant (0-50 in 7.4) and a tenacious road-holding ride. The interior is first-class European GT styling.

Even the EPA numbers are impressive: EPA estimated 24 mpg and 37 estimated highway.*

All in all, quite a coup for our Coupe.

For your nearest Porsche Audi dealer, call toll free (800) 447-4700. In Illinois, (800) 322-4400.

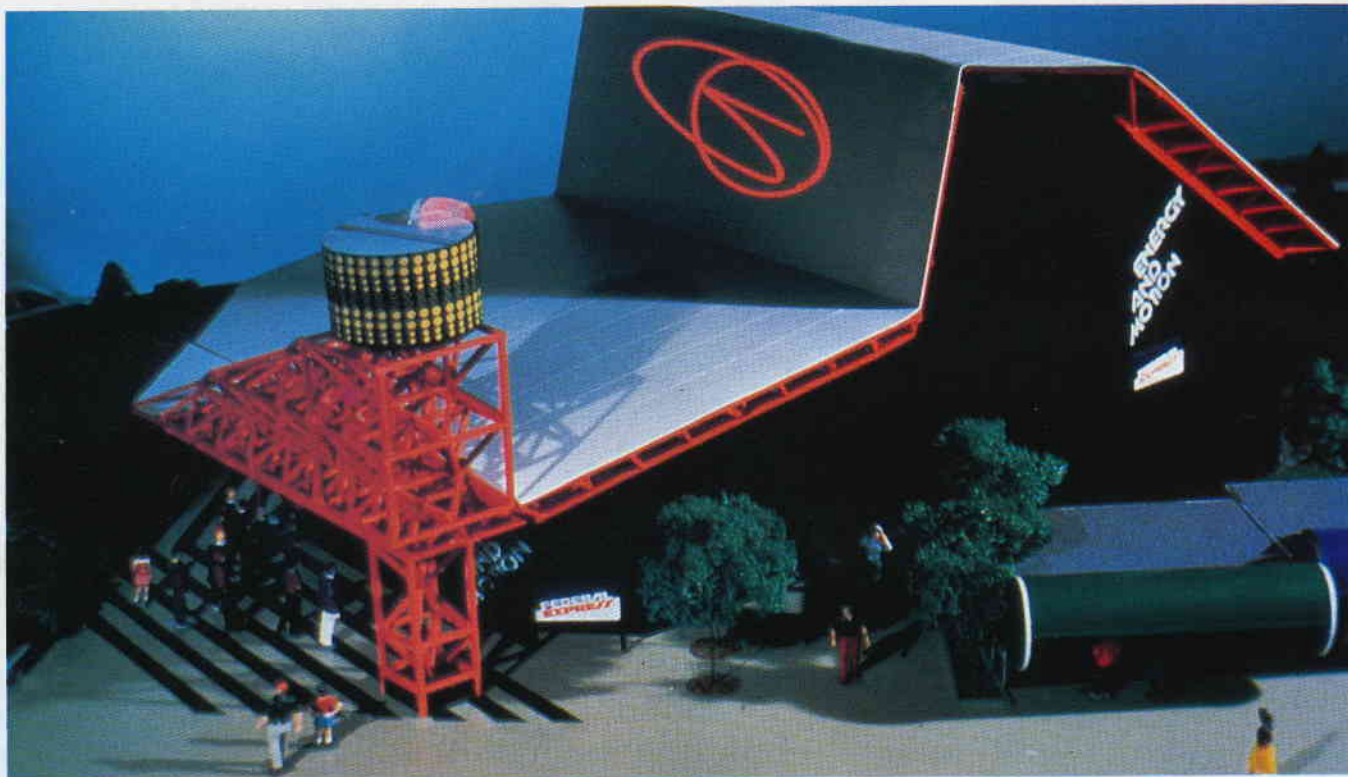
*Use "estimated mpg" for comparison. Mileage varies with speed, trip length, weather. Actual highway mileage will probably be less.

PORSCHE + AUDI

Audi: the art of engineering.

Domestic Pavilions

Federal Express



Federal Express Corp. marks its first participation at a world's fair by making history. As a major element of its pavilion, Federal Express features the largest laser sky show in history and the first ever at a world's fair.

In the building's exterior tower, these lasers can be seen projecting onto the facade of the pavilion during daylight hours and into the sky at night with a spectacular show that can be seen for miles. It is a fast-paced swirling of colors, patterns and sheets of light that creates a moving, light-

ceiling over the entire Fair site. It also provides visitors with dazzling nighttime photo opportunities.

The exhibit pavilion of this Memphis-based corporation occupies a 13,500-square-foot site across Cumberland Avenue, opposite the U.S. and Australian pavilions. It constitutes the largest single corporate participation at The 1982 World's Fair. The pavilion itself is 6,700 square feet.

As visitors wait outside to enter, they will be entertained by a series of television monitors which present

specially-prepared interviews introducing Federal Express and its people.

The exhibits inside will take approximately 25 minutes to view and consist of two exciting audio-visual presentations, enhanced by the most spectacular, state-of-the-art quadrasonic sound system ever assembled for a world's fair presentation.

The Laser Sky Show commences nightly at 9.

African-American Exhibit

Near the core of the Lifestyle and Technology Center, the African-American Exhibit is the centerpiece highlighting the achievements and contributions of Black Americans.

This three-phase exhibit consists of: the entrance; the projection television screen area, and the main theater.

The entrance of the African-American Exhibit employs two-dimensional material, including large photo panels with the theme statement (based on "African American-The Original Energy Source")

and exquisite prints reflecting Black life in America. Credit panels in this area will display the names of all corporate sponsors for the exhibit.

In the mid-section of the exhibit, the projection television screen is available for viewing by visitors waiting to enter the main theater. A variety of brief visual material will be included in this program, covering diverse subjects pertaining to the "Energy of the Black Race."

In the main theater, or central communication section, the

presentation is delivered via a two-screen, nine-projector slide-show. It features an upbeat, positive portrayal of Black America's contributions to the economic and cultural development of the nation. This seven to nine-minute production also presents aspects of Black life affected by energy factors today.

The main theater accommodates more than 4,000 visitors daily. At the conclusion of the Fair, nearly 750,000 people will have had the opportunity to view the exhibit.

Tennessee Valley Authority

Thousands of visitors from around the world have been coming to Knoxville and Tennessee Valley since the 1930s to see and study regional resource development in action.

It was here, almost 50 years ago, that one of the most dramatic experiments in American government began with the creation of the Tennessee Valley Authority. This unique government agency has pioneered the economic revival of the seven-state Tennessee Valley region and has inspired development programs to help improve living standards around the world.

The story of TVA begins with the river, and its telling takes place appropriately on two river barges moored on the Tennessee River at the south end of The 1982 World's Fair site.

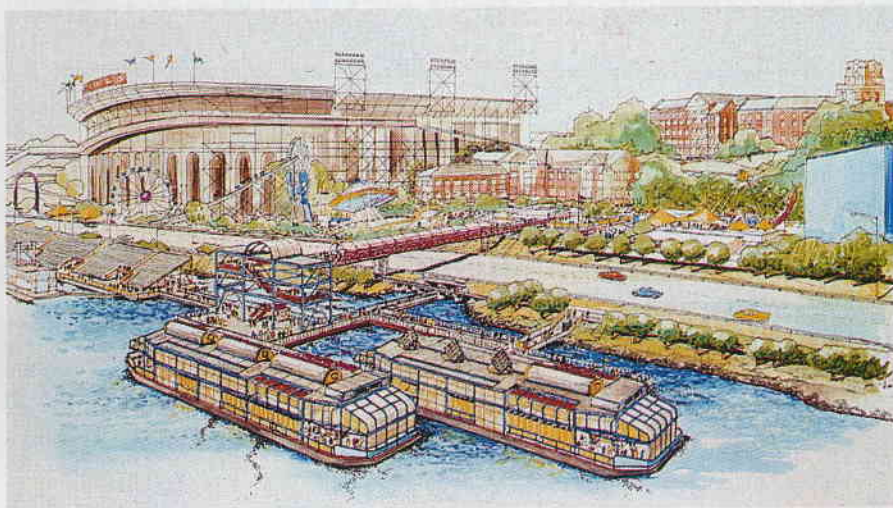
In exhibits mounted on the barges, visitors see the TVA story unfold — from helping farm families of past generations secure electricity for the first time to helping 500,000 families today learn how they can use electricity more efficiently.

The theme of TVA's 10,000-square-foot exhibit is "The Valley Adventure." Visitors retrace life as it existed in the Tennessee Valley of the 1930s and the programs undertaken by TVA and the people to reclaim the land, the river and the region's economic vitality.

They also get a feel for the massive plants, towers, power lines and fuel supplies that have helped meet the electrical energy needs of this growing, industrializing region. A simulated power system load control center, featuring video games, will enable visitors to try their hand at matching energy demands with available supply.

Other exhibits show the "hows" and "whys" of energy conservation and solar applications. An adventure theater provides the setting for live presentations about a number of ongoing TVA activities.

TVA employees and retirees are on board to answer questions and help visitors as they tour the floating exhibits. Before leaving the barges, visitors also have the opportunity to sign up for a trip to one of TVA's nearby dams and power plants. These tours are conducted each Monday through Friday, from approximately 9 a.m. until 3 p.m. Tour buses leave daily from the TVA Towers, at 400 W. Summit Hill Drive, three blocks east of The 1982 World's Fair's L&N Station.



Fair visitors also are invited to visit the lobby in the West Tower during their stay, where additional displays and a film are shown free each day prior to the opening of the Fair.

Plan to drop by the TVA building between 8 and 10 a.m., Monday through Friday, for this extra Fair-related event.



WEST TOWN MALL, East Tennessee's "Shopping Showplace," is only minutes away from The 1982 World's Fair! This retailing giant of 93 stores, including Miller's, J.C. Penney, Proffitt's, and Sears offers the complete shopping experience.



On Kingston Pike just off I-40 at West Hills Exit 380 in Knoxville.

Shop Monday thru Saturday 10 AM - 9:30 PM.
www.btm.com Most stores open Sunday 1 - 6 PM.



The more things change, the more one thing remains the same.



*The Home of the Future
Exhibit. Presented by Cathedralite and
South Central Bell.*

Things change. But one thing doesn't: our commitment to providing you with the world's best, most advanced telecommunications technology. A commitment that means developing innovative concepts in telecommunications to help take your home into the mainstream of the Information Age.

In the future, technology will help you plan menus and shopping trips with your phone and a computer. Get specialized medical treatment in your home via telecommunications. Even

start the family dinner from wherever you are by dialing home and pushing a few buttons.

You can see some experimental concepts of tomorrow's technology *today*, at the Home of the Future Exhibit, presented by Cathedralite and South Central Bell.

South Central Bell will be at the heart of telecommunications in the future. And we're ready for the changes tomorrow will bring.



Domestic Pavilion

Cathedralite, Inc. / South Central Bell

Step through the door of the "Home of the Future" and become a part of the 21st century.

Presented by Cathedralite, Inc. and South Central Bell, this 2,300-square-foot home shows dramatically how modern technology can be used to create a handsome family home. A home that is not only energy-efficient, but safe, secure, comfortable and virtually maintenance-free.

Cathedralite has designed the domed home for aesthetic appeal, complete with landscaping to complement its exterior design. A reflective roof and skylights increase the already highly-efficient passive solar and photovoltaic capabilities of the home. Exquisitely designed exterior openings and canopies are not only pleasing to the eye, but functional, since they reduce energy demand.

Inside the home, South Central Bell combines the most recent phones and services with futuristic technology to demonstrate how the customer might one day communicate in the home environment.

An experimental system, developed by Bell Laboratories, shows how a teleterminal (a marriage of the telephone and the computer) can assist with such family tasks as planning a menu for an entire week. This demonstrates how future phones will help with family needs such as recordkeeping, handling bank transactions and maintaining appointment calendars — all with the touch of a few buttons.

This design home is furnished by Pennsylvania House, manufacturer of fine furniture. Floors are by Armstrong's no-wax Solarian and Armstrong carpeting. KitchenAid provides the dishwasher, trash compactor and instant hot water dispenser. Carrier heating and cooling is provided by Andrews Distributing and installed by A.A. Air Co., Maintenance Technologies, Inc., and D.F. Shoffner Mechanical Contractors, Inc., all of Knoxville.

In keeping with The 1982 World's Fair theme, "Energy Turns The World," every component of the "Home of the Future" is integrated to produce a totally self-sufficient system. The home is intended to show the public that life in the age of energy conservation can be, and will be, just as enjoyable and comfortable as in times past.



Just Enjoy!

"Spiral-Sliced," ready to serve, that's Honey Baked Ham! It is all the convenience of a fully prepared ham ready for your table. And Honey Baked Ham is a special taste experience. Slowly cooked in hickory smoke, it takes about 30 hours to develop the rich flavors of a Honey Baked. Then it's glazed with a scrumptious blend of spices...yum! Send yourself, or your friends, Honey Baked Ham by calling our toll free shipping number 1-800-241-4343.* Honey Baked Hams are available only through Honey Baked Ham stores in most major U.S. cities. Visit our Knoxville store in Montvue Center, off Kingston Pike.



Honey Baked Ham Company

Atlanta • Charlotte • Knoxville • Pompano Beach • Tampa • St. Louis

*Those states east of the Rocky Mountain States except for Northern Maine. In Georgia call 1-800-282-4649. Copyright 1982, The Original Honey Baked Ham Company of Georgia, Inc.



©1980 Stokely-Van Camp, Inc.

**BY THE TIME
YOUR MOUTH GETS THIRSTY,
YOUR BODY COULD BE
TWO QUARTS LOW.**

Did you know that your body can sweat away from one to two quarts of fluid before you feel thirsty? Fluid made up of minerals and salts that can affect your performance.

That's why Gatorade® thirst quencher was invented: to help put back what you lose. Better than soft drinks, juices or water.

So next time you're really sweating it out, at sun-up or sun-down, before you feel dragged out and dry, help yourself to regular or Instant Gatorade®. The thirst quencher that helps your body run.

**GATORADE® GIVES YOUR BODY
WHAT IT'S THIRSTY FOR.**

Gatorade®



Domestic Pavilion

Stokely-Van Camp, Inc.

Stokely-Van Camp, Inc., the nation's largest independent food processor, has long been associated with the Knoxville area.

Stokely operations began here in 1898, and the company still maintains principal food processing and distribution facilities in the Knoxville region.

It was a natural outgrowth of this long association that the company decided to participate in The 1982 World's Fair. This participation includes two exhibits, the Stokely Folklife Festival and the Gatorade Sports Hall of Fame.

On the northern end of the Fair site, the Stokely Folklife Festival showcases the arts, heritage, traditions, crafts, entertainment and foods indigenous to southern Appalachia and the southern United States. This 2-acre tract includes two performance stages where visitors are offered continuous entertainment.

Folk craft demonstrations which can be seen here include: quilt-making, coopering (barrel making), blacksmithing, weaving, tinsmithing, rifle-making, woodcarving, rag doll-making, the crafting of musical instruments, basket-making, chair-caning and a genuine moonshine still.



Knoxville's historic L&N Hotel, on the Stokely Folklife Festival site, has been refurbished as part of the project. It includes a restaurant featuring Stokely-Van Camp food products, a lounge and viewing decks. A skyway tram carries visitors to and from the festival area and other sections of the Fair.

The Gatorade Sports Hall of Fame, a

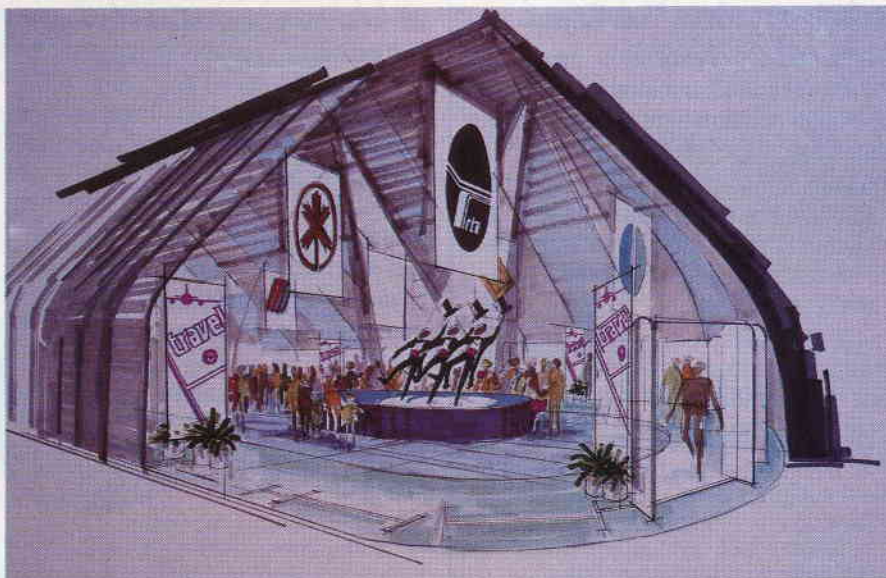
3,000-square-foot exhibit in the Lifestyle and Technology Center, features unique sports memorabilia on loan from major sports halls of fame throughout the United States. Audio-visual presentations and ESPN sports television, along with Gatorade Racing Team Car 88 from the NASCAR circuit, will be on exhibit for the duration of the Fair.

World of Travel

The expression "it's a small world" becomes increasingly truer as our capabilities in travel and communication improve. Acting as a magnet, The 1982 World's Fair has drawn together participants and visitors from every corner of the globe. Some have traveled around the world to attend this historic event.

"The World of Travel" is also a pavilion at the center of the Fair site near the "Waters of the World Lake." This 5,000-square-foot exhibit contains colorful and informative displays from Georgia, Oklahoma, Kentucky and a Florida-based company, Vacations of the Future.

The center of the pavilion contains a stage which has been provided to showcase the dramatic and musical presentations sponsored by these groups.



A service booth set up by Delta Air Lines gives visitors the opportunity to buy or exchange airline tickets and Greyhound Bus Lines and has set up a booth for travel arrangements.

www.butkus.us

SINCE 1898

STOKELY VAN CAMP

PROUD OF OUR TENNESSEE HERITAGE

The original Stokely family farm, 40 miles east of Knoxville.



"The rich fertile soil of the French Broad River Valley was the wellspring of Stokely-Van Camp, Inc., the largest inde-

pendent food processor in the U.S." "My great-grandmother Anna R. Stokely, prepared her five sons well. Each in turn experienced the full responsibility of managing our family's farmlands before going to college."

A historic transaction: Stokely acquires Van Camp.

"Three decades of expansion, product line diversification and food processing innovation culminated in 1933 with the acquisition of the Van Camp Packing Company. The union of Stokely, a packer of seasonal vegetables, with Van Camp, a packer of non-seasonal food items gave the ensuing company a broad product line with truly national stature. Yet the company still controlled its product from seedling to consumer."



36 plants nationwide to serve a growing America.

"Stokely-Van Camp, Inc. offers a wide variety of products available throughout the country. Stokely's Finest® Canned Fruits, Vegetables and Tomato Products, Van Camp's® Pork & Beans and Specialties, Popeye Popcorn, Gatorade® Thirst Quencher, Pomona Sunshine® Pimentos & Canned Vegetables and Kuner's® Pickles and other Kuner Products are familiar values to millions of Americans. We also provide a full range of products for the



food service industry; and products for the food processing industry through our Industrial Products Group. Stokely-Van Camp, Inc. serves the world from plants in Canada and the Dominican Republic, and through foreign licensees."

"Through our Central Laboratories facility in Indianapolis, food product and process development is an on-going function to meet our country's future food needs. Yet Stokely-Van Camp, Inc. has never lost sight of our humble beginnings in this beautiful Tennessee valley."



Knoxville hosts the world.

"Knoxville opens its doors to the world as the host city for the 1982 World's Fair™ to be held May 1 through October 31, 1982. We're proud of our



THE 1982 WORLD'S FAIR™

Tennessee beginnings, and we share in Knoxville's pride in being chosen to host the first World's Fair ever held in the Southeastern United States."

"Stokely-Van Camp, Inc. will be your corporate host at the 'Folklife Festival' Center. This section of the fair will focus on rural life in Appalachia, highlighting the arts, crafts and entertainment styles of the area. We also encourage you to visit the Gatorade® Sports Hall of Fame located in the Lifestyle and Technology Center. This unique exhibit features items and memorabilia from all of America's major sports."

"Stokely-Van Camp, Inc.'s 9,000 employees and 8,000 shareholders join the City of Knoxville in welcoming you to the 1982 World's Fair.™"

"Come experience real down-home hospitality."



William B. Stokely, III

Member New York Stock Exchange
Ticker Symbol SVC.

© 1982 Stokely-Van Camp, Inc.

U.S. Grocery Products Group
Industrial Products Group
Pomona Products Company
Kuner-Empson Company
Stokely-Van Camp, Inc. of Canada
Purity Mills.

STOKELY VAN CAMP



Domestic Pavilion

Tenneco / Occidental

Most people probably have never heard of oil shale, but it is not new. American pioneers crossing Colorado in the 1800s learned about oil shale from the Ute Indians, who called it "the rock that burns."

The pioneers found many uses for the oil produced from shale — from lighting campfires to greasing their wagon wheels and preserving leather.

Oil shale was formed millions of years ago by deposits of fossilized plants, small animals, clay, limestone and sand. Oil shale rock contains "kerogen," an oil precursor trapped between its layers. This kerogen can be freed from the shale when it is heated to about 900 degrees.

The oil released from the shale during this process is called shale oil, which looks much like natural petroleum and has similar physical characteristics. Like petroleum, shale oil can be upgraded and refined to produce many petroleum byproducts, including jet fuel and gasoline.

The richest deposits of oil shale in the world lie in an area known as the Green River Formation in the high desert plateaus of Wyoming, Colorado and Utah. Within this tri-state area are almost 1.8 trillion barrels of shale oil or two-and-one-half times the proven reserves of the Free World.

In keeping with the theme of the Fair, "Energy Turns the World," Tenneco, Inc. and Occidental Petroleum Corp. are jointly sponsoring an 11,040-square-foot exhibit dramatizing the production of oil from shale.

Commenting on Occidental's involvement in the fair, Chairman and Chief Executive Officer Dr. Armand Hammer said, "It is our preception that few people know about oil shale and the technology for extracting oil from it. It is our purpose in participating in this exhibit to better inform the public and government about this domestic resource and our nation's need to utilize it."



The educational exhibit which focuses on the two companies' application of Occidental's Modified In-Situ (MIS) process for retorting shale, consists of a film and a photo display housed in three structures. The exhibit's surrounding landscape is composed of some oil shale rock brought in from Colorado. Additional oil shale rock is from Tennessee. The combination of futuristic architecture and a rustic, rocky environment creates an intriguing contrast.

The structures in the exhibit were designed by the Chicaco-based Design Investigations Group and are part of Tenneco's contribution to the project. The first part contains mural-sized photos taken at Tenneco's and Occidental's shale oil project site in Colorado. A guide will highlight the tour with information about the project.

The second part of the exhibit, a simulated mine drift, has been painstakingly recreated to represent the real thing. The drift leads to a geodesic-dome theater, where a film on the production of shale oil will be shown.

The 10-minute film, *Into the 21st Century* is Occidental's contribution to the exhibit and was written, produced and directed by its in-house film company, Armand Hammer Productions. The film contains footage of the sponsor's oil shale project site in Colorado. It uses animation and special effects to add impact.

J.L. Kettlesen, chairman and chief executive officer of Tenneco, said "The fair will be an appropriate showcase for the 21st century technology we and Occidental are using in the development of supplemental energy for the future."

Cathedral Bluff Shale Oil Co., the Tenneco-Occidental equal partnership, has been developing an underground mine on a 5,094-acre federal lease of the "C-b tract" in Northwestern Colorado.

Tenneco, a diversified company, is headquartered in Houston. In 1981, the company derived nearly 80 percent of its operating income from energy operations, with major activity in oil and gas exploration and production, natural gas transportation, chemicals, construction and farm equipment, ship building, agriculture and land management, automotive components, packaging and life insurance.

Occidental Petroleum Corp., headquartered in Los Angeles, is the largest independent oil producer worldwide. Through diversification into chemicals, coal, minerals and agribusiness operations, it has grown into approximately the 15th largest U.S. industrial corporation among the Fortune 500.

www.butkus.us