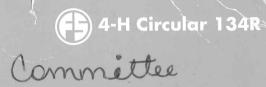
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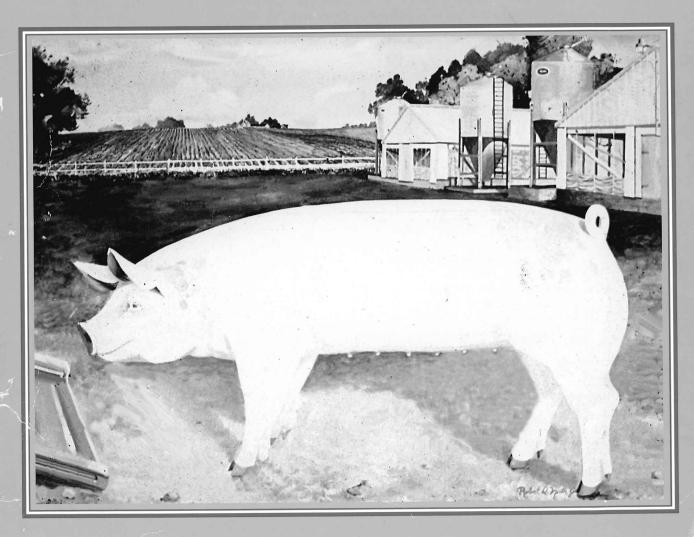
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Swine Resource Handbook

for Market and Breeding Projects



Name

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County

Advisor's Name

Club Name

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Swine Resource Handbook for Market & Breeding Projects

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Requirements for this Project

- 1. Purchase the Swine Resource Handbook (this book) and use in conjunction your respective Project/Record Book.
- 2. Complete your respective Project/Record Book every year a market hog or swine breeding project is taken.
- 3. Make sure your project entry form is completed and turned in to the county office on time.
- 4. Contact a local veterinarian for health papers if your county requires them.
- 5. Be sure to review the rules outlined in your county fair premium book if you plan on participating at your county fair. Regulations vary from county to county.
- 6. Keep project animals in your continual care and possession on or before the designated ownership date.
- 7. Sell, don't take home your market hog after exhibiting at a place where a junior livestock sale was conducted.

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Chapter 1 Introduction

Swine Project Opportunities

Swine projects are excellent for 4-H members because pigs are trainable and young people can work with them easily. Advantages of the swine project include:

- 1. small initial investment;
- 2. quick turnover of return;
- 3. small space requirements;
- 4. training in selection, feeding, management;
- 5. relatively inexpensive housing and equipment for the beginner;
- 6. possibility of expanding the project into a profitable enterprise;
- 7. understanding of animal needs and welfare.

Benefits to a 4-H'er

- 1. Selection in Judging. From the time you select your feeder pig or breeding gilt to the time of showing, you will be learning what characteristics to look for in a modern pig.
- 2. Record Keeping. Part of the requirement for a swine project is record keeping. By keeping records, you will learn costs of feed and equipment, perhaps learn about bank loans, and hopefully establish a bank account for your education.
- 3. Nutrition. You will learn the nutrient requirements of swine and how to

- balance a diet—the diet for the fastest, most economical gain.
- 4. Health. Learning about swine diseases and parasites and their control is a part of your training in project lessons.
- 5. Competition. You will benefit from learning to fit and show your project, to win or lose gracefully.
- Ownership Pride. Owning and caring for pigs gives you a feeling of pride and satisfaction.
- 7. Professional and Social Development. Having a pig project will bring you into contact with successful swine breeders and producers, project leaders, and other 4-H members.
- 8. Consumer Awareness. Raising a market animal will help you better understand how meat enters our food chain.

Additional Learning Experiences

- 1. Be part of a meat judging team.
- 2. Participate in a livestock judging contest or be a member of a county team.
- 3. Attend livestock project seminars.
- 4. Demonstrate fitting and showing.
- 5. Attend other county hog shows.
- 6. Attend your State Fair.
- 7. Visit a swine operation.
- 8. Visit a feed mill.
- 9. Visit a local veterinarian.
- 10. Visit a packing plant.
- 11. Visit a grocery store to study the different ways pork is sold.

- 12. Learn how to use a backfat probe.
- 13. Learn the various breeds of swine.
- 14. Attend or complete a program on Quality Assurance

Subjects for 4-H Club Talk

- Why I chose a pig project.
- What I have learned in my pig project.
- Useful by-products of swine.
- The importance of the swine industry.
- Swine diseases.

- How to prepare a hog for show day.
- Animal welfare. (Well being)

Teamwork for the Common Goal

The purpose of all project work is to enhance the education, experience, and development of young people, a purpose that is not realized without the involvement of several people working as a team. The successful completion of the swine project depends upon the combined efforts of parents, experts, 4-H leaders and you. All have responsibilities.

To Parents

Behind most successful club members are parents who are truly enthusiastic about the projects their children are taking. These parents offer supervision, assistance and encouragement to the 4-H'er as she or he works through a project. And this pays off—in an exciting learning experience and sometimes even in winning honors and prizes at

the county and state fairs. If you are willing to help in these ways, it will make a difference.

However, be aware that while parental support is clearly important, it is equally important that parents not go too far with it. That is, as a parent of a 4-H'er undertaking a project, you should assist and supervise to a reasonable extent; help out as much as is necessary, but do not do the

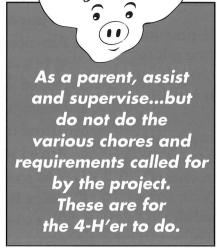
various chores and requirements called for by the project. These are for the 4-H'er to do. It is also inappropriate for a professional to own, care for, or groom the project animal. 4-H members are to own their project animals and keep those animals under their care.

Also keep in mind that most projects (especially those involving animals) will require several adjustments at home and some

this project, separate pens, a shed, and a lot will be needed, as well as facilities for feeding the project animal and materials for keeping records. It may be necessary also to purchase special feed supplements and special grooming and showing equipment.

Remember, your son or daughter's success in this and all projects depends to a large extent on the encouragement

and support (in the appropriate measures) that only you can give.



1-2 Introduction Chapter 1

To the 4-H Advisor

As people directly concerned with youth development, it is the responsibility of every 4-H advisor and agent to help each member who wants a swine project (and has financing and suitable facilities) to secure one. Keep in mind that people like you, in such positions, have exceptional influence with youth, and your encouragement and help lead not only to completed projects, but contribute as well to the development of responsible citizens.

To the Member

After you have made the decision to take a market and or breeding project, it is important that you know what type of pig you are looking for, how to feed it, diseases it may have, management techniques, and many other important concepts.

By teaching you these principles through information and experience, this project will make it possible for you to produce a high-quality, lean, juicy end product—pork that the consumer wants to buy. To have a successful project you must be willing to study and review the information contained in this handbook and apply it.

Chapter 1 Introduction 1-3

1-4 Introduction Chapter 1



Chapter 2 History

The Incredible Pig!

Ancient Times to America

Early History

- The history of pork production speaks to the unique adaptability and amazing utility of that extraordinary animal, the pig.
- The pig was among the first animals to be domesticated, probably as early as 7000 B.C.



- Pork was widely consumed throughout the ancient world and the Roman Empire.
- Pigs were first introduced to North America in 1539 when Hernando de Soto brought them to the Florida mainland.

Colonial Days

- Early colonists brought pigs to the new settlements on the Atlantic seaboard in the late 1500's.
- The practice of finishing hogs on Indian corn (maize) was first adopted as a common practice in Pennsylvania in the late 1600's.



- Introduction of the Old World's pig to the New World's corn laid the foundation for the modern U.S. pork industry.
- In the colonies, hogs were taken to market in large droves and over trails that later became the routes of the major railroads.

The Nation Expands Westward

- The Louisiana Purchase in 1803 opened up a large area of the country for agricultural development. Live hogs in considerable number were shipped to New Orleans via the Ohio and Mississippi Rivers.
- The opening of the Erie Canal in 1825 provided the first all-water connection from the Great Lakes to New York City.
 - It permitted hogs and salted or smoked pork products to be shipped (in barrels) east by water transport.



- In 1827, the Erie Canal system was connected to Cincinnati and, via the Ohio River, to the Mississippi. Trade in hogs and pork products flourished.
- As the nation expanded, farmers relied on their hogs not only to provide sustenance for their families, but also to help them pay for their new homesteads.

That unique profit quality earned the hog the title "Mortgage Lifter."



• By 1863, Cincinnati, Ohio was such a major pork processing center that it was widely known as "Porkopolis." By 1865, the Civil War had greatly interfered with access to that city.



 The turmoil following the Civil War, combined with development of the great American railroads, shifted the center of hog production further west and soon Chicago was the world's largest pork packing center. It became known as "Hog Butcher to the World."

Railroads and War Years Bring Changes

• Invention of the refrigerated rail car in 1870 enabled fresh pork to be shipped over long distances without spoilage. Previously pork had to be salted or smoked before shipment.



• Development of a national railroad system, coupled with invention of the refrigerated rail car, brought about

centralization of pork processing for much of the nation. Big packing plants were located at major railroad



centers such as Chicago and Omaha by the 1880's.

• From the later 1880's through the late 1940's, consumer demand for lard,

primarily for cooking purposes, was so considerable that pork producers obliged consumers by raising relatively



fat hogs that would meet these demands.

- During World Wars I and II pork went to war, providing the basis for "C" and "K" rations for soldiers in the field. The fat derived from the incredible pig also went into the making of nitroglycerine for use in explosives to help win the war.
- The end of World War II brought great changes. The market for lard and other byproducts of fat from hogs started to decline and consumers began thinking more about health and diet and the desire for leaner meat products.



The Development of a Leaner Pig

• In the early 1950's, U.S. pork producers concentrated their efforts on developing a

leaner type hog that would meet increasing consumer demands for leaner meat



products, relatively low in cholesterol and fat.

 Today, a combination of factors, including improved genetics, better feeding practices,

and the foresight and determination of America's pork producers, has



- resulted in a market hog 50% leaner than it was in the late 1960's.
- America's pork producers have set a goal of making pork the meat of choice in the

United States in the 21st century. It has long enjoyed that distinction in most other parts of the world.



Courtesy of the National Pork Producers Council in cooperation with the National Pork Board.

Chapter 2

2-4 History Chapter 2