



AMERICAN MEAT SCIENCE ASSOCIATION

Meat Evaluation

CERTIFICATION



CERTIFICATION BLUEPRINT

CERTIFICATION EXAM OVERVIEW

The AMSA Meat Evaluation Certification confirms that individuals have the essential knowledge and skills for the meat animal industry. The certification exam, hosted on the iCEV testing platform, consists of 100 questions. It evaluates understanding of meat science principles, animal harvesting procedures, USDA beef grading, and retail cut fabrication and identification. The exam must be proctored in a controlled environment. Proctoring guidelines can be found at www.icevonline.com/proctoring-guidelines.

More information about the certification and testing platform can be found at: <https://www.icevonline.com/meat-evaluation>.

ABOUT THE AMERICAN MEAT SCIENCE ASSOCIATION

The American Meat Science Association (AMSA) is dedicated to advancing meat science through leadership, education, and professional development. They foster a learning community of meat scientists, industry partners, and other stakeholders. AMSA members conduct research and education in muscle growth, meat quality, food safety, processing technology, and consumer and marketing issues.

Learn more at: <https://meatscience.org/>.

INDUSTRY STANDARD OVERVIEW



LEARNING OBJECTIVES & INDUSTRY STANDARDS

1. Meat Science Principles

1.1 Meat Science & Food Safety

- 1.1.1 To explore legislation and history in relation to the meats industry
- 1.1.2 To study animal care and handling techniques
- 1.1.3 To identify the nutritional content and benefits of meat
- 1.1.4 To consider consumer options when purchasing meat
- 1.1.5 To describe meat storage and handling practices
- 1.1.6 To understand meat cooking methods
- 1.1.7 To study meat additives and processed meats
- 1.1.8 To analyze food safety practices and causes of foodborne illnesses

2. Animal Harvesting Procedures

2.1 Harvesting of Livestock

- 2.1.1 To describe the livestock harvesting process
- 2.1.2 To explain federal and state meat inspection standards
- 2.1.3 To identify retail and wholesale cuts of meat correlated to major muscle groups and meat by-products

3. Carcass Cuts & Evaluation

3.1 Meat Evaluation: Beef Carcasses

- 3.1.1 To evaluate quality factors related to beef carcasses
- 3.1.2 To evaluate cutability factors related to beef carcasses
- 3.1.3 To decide placings for classes of beef carcasses

3.2 Meat Evaluation: Beef Ribs

- 3.2.1 To evaluate quality factors related to beef ribs
- 3.2.2 To evaluate cutability factors related to beef ribs
- 3.2.3 To decide placings for classes of beef ribs

3.3 Meat Evaluation: Beef Full Loins

- 3.3.1 To evaluate quality factors related to beef full loins
- 3.3.2 To evaluate cutability factors related to beef full loins
- 3.3.3 To decide placings for classes of beef full loins

3.4 Meat Evaluation: Beef Short Loins

- 3.4.1 To evaluate quality factors related to beef short loins
- 3.4.2 To evaluate cutability factors related to beef short loins
- 3.4.3 To decide placings for classes of beef short loins

3.5 Meat Evaluation: Beef Rounds

- 3.5.1 To evaluate quality factors related to beef rounds
- 3.5.2 To evaluate cutability factors related to beef rounds
- 3.5.3 To decide placings for classes of beef rounds

3.6 Meat Evaluation: Pork Carcasses

- 3.6.1 To evaluate quality factors related to pork carcasses
- 3.6.2 To evaluate cutability factors related to pork carcasses
- 3.6.3 To decide placings for classes of pork carcasses

3.7 Meat Evaluation: Pork Hams

- 3.7.1 To evaluate quality factors related to pork hams
- 3.7.2 To evaluate cutability factors related to pork hams
- 3.7.3 To decide placings for classes of pork hams

3.8 Meat Evaluation: Pork Loins

- 3.8.1 To evaluate quality factors related to pork loins
- 3.8.2 To evaluate cutability factors related to pork loins
- 3.8.3 To decide placings for classes of pork loins

3.9 Meat Evaluation: Lamb Carcasses

- 3.9.1 To evaluate quality factors related to lamb carcasses
- 3.9.2 To evaluate cutability factors related to lamb carcasses
- 3.9.3 To decide placings for classes of lamb carcasses

4. Retail Cut Fabrication & Identification

4.1 EXCEL Beef Plant: Fabrication

- 4.1.1 To understand grading, tagging, and sorting procedures
- 4.1.2 To analyze fabrication techniques
- 4.1.3 To become familiar with storage facilities
- 4.1.4 To identify shipping and receiving procedures
- 4.1.5 To understand quality assurance

4.2 EXCEL Pork Plant: Fabrication

- 4.2.1 To learn the steps involved in fabricating hog carcasses
- 4.2.2 To learn about lean recovery, ground pork and lean trip products
- 4.2.3 To understand how by-products are rendered into edible and in-edible by-products
- 4.2.4 To be aware of the steps taken to ensure products are produced in a safe and sanitary environment

4.3 Retail Cut ID

- 4.3.1 To identify retail cuts of beef
- 4.3.2 To identify retail cuts of pork
- 4.3.3 To identify retail cuts of lamb
- 4.3.4 To identify variety meats

5. USDA Beef Grading

5.1 Meat Evaluation: Beef Quality Grading

5.1.1 To understand why quality grades are important

5.1.2 To examine maturity of beef carcasses

5.1.3 To examine marbling of beef carcasses

5.1.4 To look at the factors used to calculate final quality grades

5.2 Meat Evaluation: Beef Yield Grading

5.2.1 To understand why yield grades are important

5.2.2 To look at the factors used to calculate final yield grades