

## **FFA AGRICULTURAL ENGINEERING**

Made in Agricultural Education Engineering Department during the current school year. Each exhibitor may enter only one exhibit in each of the classes. Each entry must be signed by an FFA Advisor. A rosette will be given to the best entry in classes consisting of five or more entries.

### **J – 200 – WOODWORKING**

- J-200 Small projects (predominantly wood) – tool carriers, cutting board, nail box, etc.
- J-201 Medium projects (predominantly wood) – farm gates, tool cabinets, hog feeders, one saw horse, etc.
- J-202 Large projects (predominantly wood) – hog houses, beef feeders, wagon beds, etc.

### **J-300 – WELDING**

- J-300 Small projects (predominantly welding) i.e. foot scrapers, C-clamps, etc.
- J-301 Medium projects (predominantly welding) i.e. hog troughs, calf feeders, etc.
- J-302 Large projects (predominantly welding) in order to construct i.e. wagon running gear, trailer, farrowing crates, etc.
- J-303 Sample Arc Welding demonstration board – a 3" long butt, 3" long lap, and 3" long T weld on 3/16" thick metal showing starting and stopping of weld, mounted on a 6" x 12" wood panel.
- J-304 Sample MIG Welding Demonstration Board – 3" long butt, 3" long lap and 3" long T weld on 3/16" thick metal showing starting and stopping of weld, mounted on a 6" x 12" wood panel.
- J-305 Sample Oxy-acetylene Welding Demonstration Board – a 3" long fusion corner weld, 3" long brazed T weld, 3" long steel welding butt weld and an example of cutting metal with oxy-acetylene mounted on a 6" x 12" wood panel. Use 1/8" x 1/2" metal.
- J-306 Sample TIG Welding Demonstration Board – a 3" long butt, a 3" long lap and 3" long T weld on 3/16" thick metal showing starting and stopping of weld, mounted on a 6" x 12" wood panel.

### **J-400 – HOME IMPROVEMENT PROJECTS**

- J-400 Small projects – bookend, table lamps, etc.
- J-401 Medium projects – card table, coffee table, etc.
- J-402 Large projects – desk, bed frame, etc.
- J-403 Home improvement – wood restoration (wood equipment, furniture, etc.)
- J-404 Construction Electric – cord carrier, electric circuit, etc.

### **J-500 METAL**

- J-500 Small projects – feed scoops, hay hooks, etc.
- J-501 Other metal projects – machined metal (tool & die, lathe, etc.)

### **J-600 AG MECHANICS**

- J-600 Restoration and/or repair of a single cylinder engine—this project should include the actual entry and a photo display depicting the student's work on the project. The photo display, of not less than 6 or more than 12 photos, may be color or black & white photos that are not larger than 4" x 6" with descriptions not exceeding 50 words per photo.
- J-601 Restoration and/or repair of a multi-cylinder engine or tractor—this project should include the actual entry and a photo display depicting the student's work on the project. The photo display, of not less than 6 or more than 12 photos, may be color or black and white photos that are not larger than 4" x 6" with descriptions not exceeding 50 words per photo.
- J-602 Restoration and/or repair of a farm implement not fitting into the other J-600 categories. This project should include the actual entry and a photo display depicting the student's work on the project. The photo display of not less than 6 or more than 12 photos, may be color or black and white photos that are not larger than 4" x 6" with descriptions not exceeding 50 words per photo.
- J-603 Cooperative Project. Two or more individuals may enter the same project (i.e. restored tractor, spreader, etc.), however, only one premium will be awarded and that person must be designated at the time of entry.

