*1701. Battery powered series and parallel circuits (Circuits must include both series and parallel, a simple switch and can be no more than 9 volts.)

*1702. Homemade Galvanometer (Must be able to detect the presence of an electrical current.)

*1703. Electromagnetic Circuits (Must be a working electromagnet with a simple switch and can be no more than 9 volts.)

*1704. Simple homemade DC motor (Rotor must turn under its own power.)

INVESTIGATING ELECTRICITY – All exhibits must be DC powered

*1705. Battery powered series or parallel circuit (Circuit may be either series or parallel, must contain either a momentary and/or three way switch, a circuit diagram with explanation and can be no more than 9 volts.)

*1706. Original design soldered circuit project (Circuit must contain an on/off switch, a motion or tilt activated switch, a light and sound producing device and must be powered by 9 volts. All connections in the circuit must be soldered and a circuit diagram with explanation must be included.)

WIRED FOR POWER (All exhibits must be AC powered and be able to be safely connected and disconnected from a standard 120 volt duplex outlet.

*1707. Display of wire sizes and types with description and example of usage (Display must contain at least 12 different examples.)

*1708. Simple household or farm use circuit (Circuit must contain one single pole switch controlling one electrical load device. Circuit should be mounted on a sturdy mounting surface and free standing. Wiring should be done with Romex NM-B 12 gauge wire and clamped or stapled appropriately. A circuit diagram with explanation must be included.)

*1709. Complex household or farm use circuit (Circuit must contain at least two three-way switches, and may also contain a four-way switch, controlling one electrical load device. The circuit must also contain a working duplex electrical outlet. Circuit should be mounted on a sturdy mounting surface and free standing. Wiring should be done with Romex NM-B 12 gauge wire and clamped or stapled appropriately. A circuit diagram with explanation must be included.)

*1710. Table, desk, vanity, or floor lamps (any purpose – original design or kits) Pop-Can Lamp kits should be entered in Home Environment.

ENTERING ELECTRONICS (Exhibits may be either DC or AC powered. AC powered exhibits must be able to be safely connected and disconnected from a standard 120 volt duplex outlet.)

*1711. Basic electronic circuits without solid-state components (from project book)

*1712. Basic electronic circuits with solid-state components (from kit)

*1713. Basic electronic circuits with solid-state components (Original circuit design, must include circuit diagram and explanation.)

GREEN ENERGY

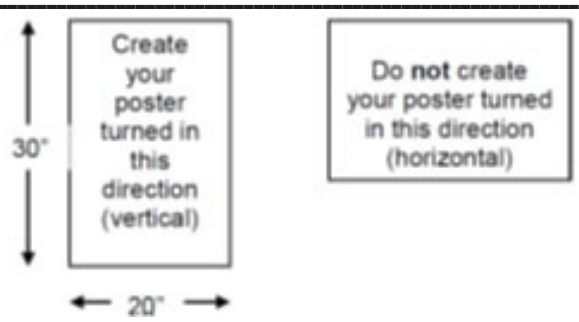
*1714. Wind or solar powered energy project (from kit)

*1715. Wind or solar powered energy project (original design)

1716. Miscellaneous electricity

TUESDAY MORNING/AFTERNOON JULY 16, 2019
DIVISION A 10:00am-7pm

4-H Consumer & Financial Education 1800's



Level 1 (Grades 4-5): The Consumer in Me

*1800. Poster on "Bargain Shopping" – For Grades 4-5 – Complete a cost comparison chart for one product you and your family use as outlined in the activities under "Bargain Shopping" on pp. 20-21. Use 20" x 30" foam core board or cardboard, turned in a vertical direction. Write a narrative telling how the decision making process was used to reach your final choice; include answers to the questions in "Check This Out!" on p. 21. At the end of the narrative, list the sources of information used in researching the topic. Make a poster on "comparison shopping." Include name, age, and county at top of narrative. The narrative can be handwritten or a computer printout; single or double spaced; on plain white or notebook paper, one to two pages, written/printed on front side only. Place the narrative in a plastic sleeve. Attach the sleeve to the back of the poster with tape or a binder clip.

*1801. Poster on "What is the Best Buy?" – For Grades 4-5 – Complete a cost comparison chart for two products in three different sizes as outlined in the activities on pp. 22-23. Use 20"x30" foam core board or cardboard, turned in a vertical direction. Write a narrative telling how the decision making process was used to reach your final choice; include answers to the question in "Check This Out!" on p. 23. At the end of the narrative, list the sources of information used in researching the topic. Make a poster on "checking prices". Include name, age, and county at top of narrative. The narrative can be handwritten or a computer printout; single or double spaced; on plain white or notebook paper, one or two pages, written/printed on front side only. Place the narrative in a plastic sleeve. Attach the sleeve to the back of the poster with tape or a binder clip.

Level 2 (Grades 6-8): Consumer Wise

*1802. Poster on "Media and the Marketplace" – For Grades 6-8 – Complete a commercial comparison as outlined in the activities on pp. 18-19. Use 20"x30" foam core board or cardboard, turned in a vertical direction. Write a narrative of your answers to the questions in "Check This Out!" on p. 19 and tell what conclusions you were able to draw from the experience. At the end of the narrative, list the sources of information you used in researching your topic. Make a poster related to "advertising aimed at young people". Include name, age, and county at top of narrative. The narrative can be handwritten or a computer printout; single or double spaced; on plain white or notebook paper; one to two pages, written/printed on front side only. Place the narrative in a plastic sleeve. Attach the sleeve to the back of the poster with tape or a binder clip.

*1803. Poster on "Decision! Decisions! Decide!" – For Grades 6-8 – Complete the 6-Step Decision Making process on any item you wish to purchase as outlined in the activities on pp. 12-13. Use 20"x30" foam core board or cardboard, turned in a vertical direction. Write a narrative of your answers to the questions in "Check This Out!" on p. 13 and tell what conclusions you were able to draw from the experience. At the end of the narrative, list the sources of information you used in researching your topic. Make a poster related to "the consumer decision-making process". Include name, age, and county at top of narrative. The narrative can be handwritten or a computer printout; single or double spaced; on plain white or notebook paper, one to two pages, written/printed on front side only. Place the narrative in a plastic sleeve. Attach the sleeve to the back of the poster with tape or binder clip.

Level 3 (Grades 9-12): Consumer Roadmap

*1804. Poster on "How to Write a Wrong" – For Grades 9-12 – Write a complaint letter as outlined in the activities on pp. 22-23. Use 20"x30" foam core board or cardboard, turned in a vertical direction. Write a narrative of your answers to the questions in "Check This Out!" on p. 23 and tell what conclusions you were able to draw from the experience. At the end of the narrative, list the sources of information you used in researching your topic. Make a poster related to "resolving a consumer complaint". Include name, age, and county at top of narrative. The narrative can be handwritten or a computer printout; single or double spaced; on plain white or notebook paper, one to two pages, written/printed on front side only. Place the narrative in a plastic sleeve. Attach the sleeve to the back of the poster with tape or a binder clip.

*1805. Poster on "I Own a Car or Does It Own Me?" – For Grades 9-12 – Calculate and illustrate the costs of owning a car as outlined in the activities on pp. 28-31. Use 20"x30" foam core board or cardboard, turned in a vertical direction. Write a narrative of your answers to the questions in "Check This Out!" on pp. 29-30 and tell what conclusions you were able to draw from the experience. At the end of the