Use of Reproductive Hormones

**Purpose:**
To provide guidance for the use of Hormones in the laboratory and animal facility environment. Various reproductive hormones are used at UW-Madison in animal research for a variety of research applications. Substances include but are not limited to Gonadotropin releasing hormone, Human chorionic gonadotropin, Testosterone, Estradiol, Progesterone, Prolactin, and Prostaglandin F2a.

**Precautions:**
The following information can be used to complete the Safety section of your animal protocol.

1. **Chemical hazard agents** – (Identify the category of the chemical): *(Select the following)*
   - Carcinogen
   - Reproductive Hazard/Teratogen

2. **Containment preparation** – (Containment equipment required for the preparation of the chemical): *(Select both options and include additional information for Other)*
   - Fume Hood
   - Other: if powder form is used then that preparation will be done in a fume hood and safety glasses will be worn in addition to standard PPE.

3. **Containment animals** – (Containment equipment required for chemical administration and handling animals after exposure to the chemical): *(Select the following)*
   - No special containment needed

4. **PPE needed** - (for handling live animals, carcasses or animal waste/dirty bedding): *(Select all of the following)*
   - Exam gloves – nitrile
   - Safety glasses/goggles
   - Lab coat or disposable gown

5. **Waste Disposal**: (disposal of animal waste/dirty bedding from animals after exposure to the chemical) *(Select the following)*
   - No special precautions needed for waste/dirty bedding

6. **Carcass disposal**: *(Select the following)*
   - Pick up by EH&S for incineration.
   - NOTE: For agricultural animals, select Other and add “Use facility standard method.”

7. **Chemical human risk**: *(Add the following for the appropriate hormone)*
- Most reproductive hormones are potentially toxic as teratogens and carcinogens. Pregnant and lactating women should avoid exposure to reproductive hormones.
- For Estrumate (prostaglandin F2a) add the following: Estrumate is reproductive and respiratory (including asthmatics) hazard so it should be handled with extreme caution. Estrumate is readily absorbed through the skin and may cause abortion and/or bronchospasm.

Additional Information:
For reproductive hormones used in the farm environment PPE needed includes long sleeves and nitrile/latex gloves. If fume hood is unavailable or the powder will remain in contained in a closed bottle, containment preparation should be performed in a well ventilated area.

References:
“Testosterone SDS”

“Estrogen SDS”

“Progesterone SDS”

“Prolactin SDS”

“Estrumate guidance”