

**Pulse 500**  
NEEDLE-FREE

## Variable Dose Needle-Free Injection System for Beef and Dairy

Pulse® 500 – Ideal for Beef and Dairy Operations

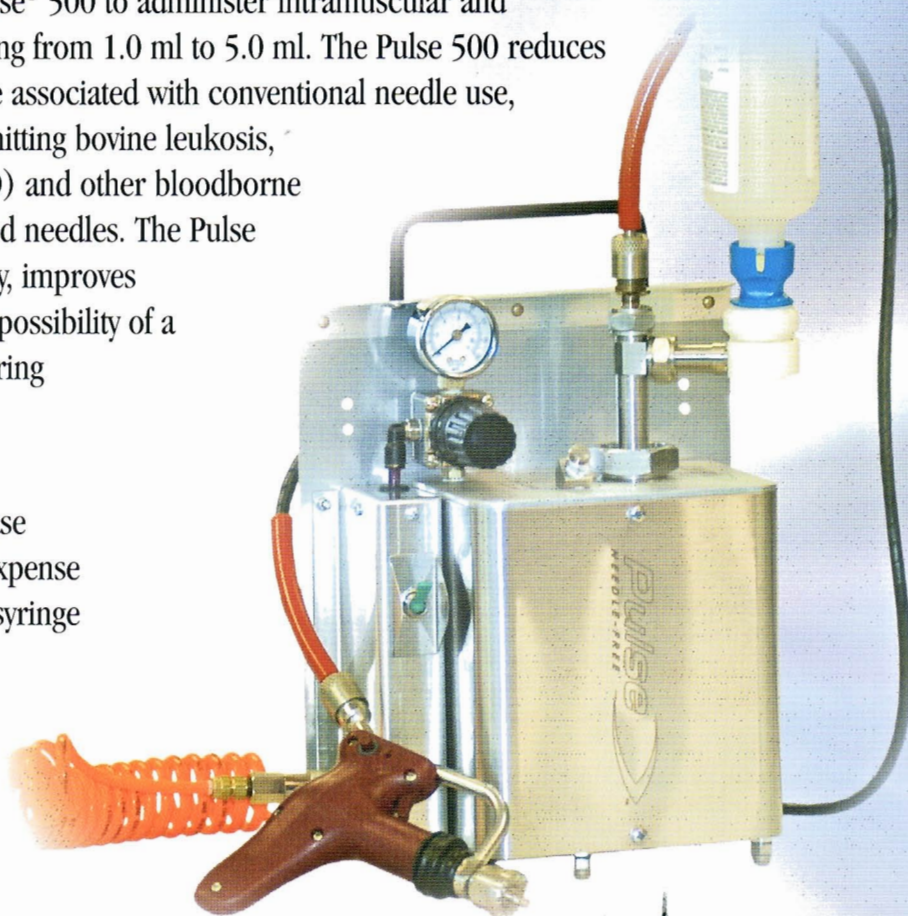
Beef and dairy producers can use the Pulse® 500 to administer intramuscular and subcutaneous injections in dosages ranging from 1.0 ml to 5.0 ml. The Pulse 500 reduces injection site reactions and tissue damage associated with conventional needle use, and significantly lowers the risk of transmitting bovine leukosis, anaplasmosis, bovine viral diarrhea (BVD) and other bloodborne diseases transferred through contaminated needles. The Pulse 500 also improves food and worker safety, improves vaccination efficiency, and eliminates the possibility of a broken needle or a needle fragment entering the food system.

### Bottom line benefits

Beef and dairy producers can now increase profitability and eliminate the risks and expense associated with conventional needle and syringe use with the new Pulse 500 needle-free injection system.

Benefits of the Pulse 500 include:

- Eliminates needle fragments in meat
- Eliminates disease transmission from contaminated needles
- Reduces injection site tissue damage and trim losses
- More consistent and accurate delivery of injected product
- Improves vaccination efficiency
- Sets new standard for worker safety
- Reduces hazardous waste



For more information about the Pulse 500, contact Pulse NeedleFree Systems at:

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