

Quantification Protocol for Reducing Days on Feed of Cattle

Alberta Protocol Stakeholder Consultations
Baseline Emissions Management Inc.

Reducing Days on Feed of Cattle

- Seed Materials

- AB Protocols: *Including Edible Oils in Cattle Feeding Regimes and Reducing Slaughter Age of Cattle*
- Good Practice Guidance
 - CDM protocols
 - Project evaluations

- Technical Review

- Alberta process with gov't and industry stakeholders

Reducing Days on Feed of Cattle

- **Project Condition**

- Reducing enteric methane emissions from cattle, emissions from manure handling, storage and application from reducing the days of feed for cattle being finished on feed lots.

- **Baseline Condition**

- Operating conditions at the project farm prior to the change in practises
- Defined by average number of days on feed for animals within weight groupings

Reducing Days on Feed of Cattle

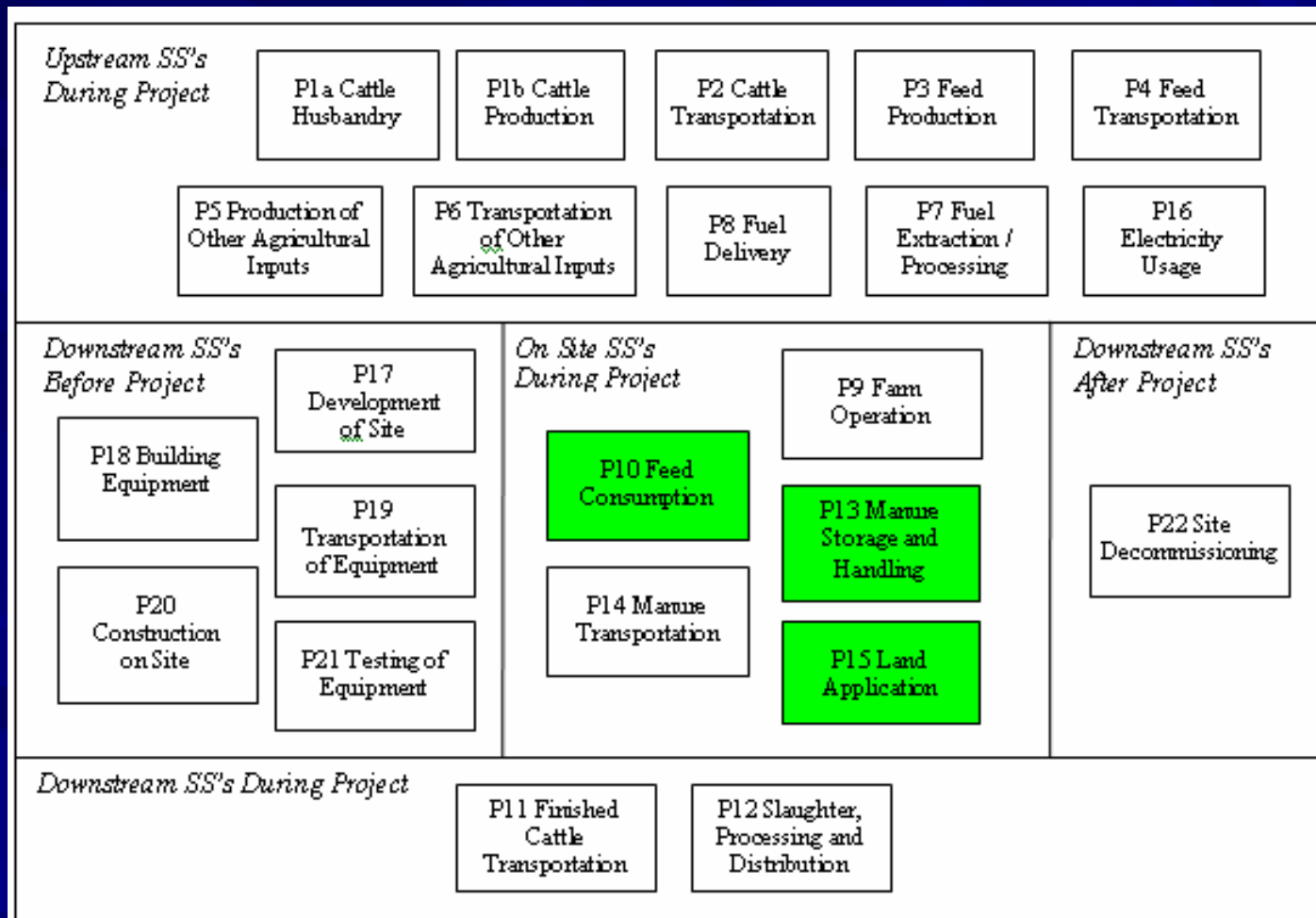
- Functional Equivalence
 - Equivalent energy production
 - No change to the product or service
- Emission Reduction Mechanisms
 - Reduce the days of feed for cattle being finished on feed lot.
- Applicability criteria
 - Farms must be currently storing manure and applying manure or custom applying manure to land;
 - Farms must demonstrate a change in the number of days their cattle were on feed, and;
 - The quantification of reductions achieved by the project is based on actual measurement and monitoring.

Reducing Days on Feed of Cattle

- Flexibility mechanisms
 - Farms that include edible oils may also apply the Edible Oils protocol in parallel with this protocol
 - Site specific emission factor usage
 - Farms without three years of data may use available data and industry practice to establish a baseline
 - Grouping of animals with similar weights/days on feed characteristics

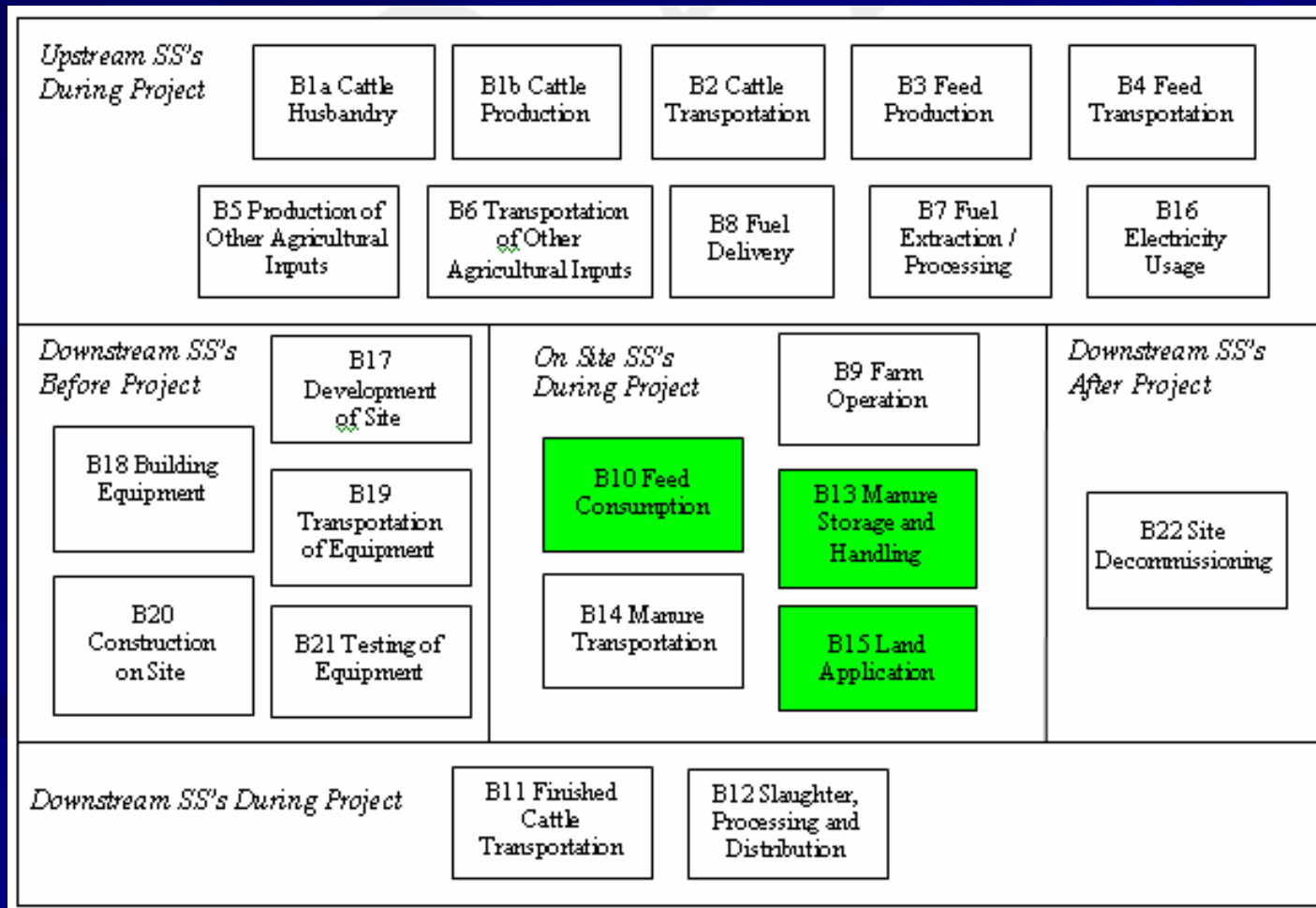
Reducing Days on Feed of Cattle

Project Condition



Reducing Days on Feed of Cattle

Baseline Condition



Reducing Days on Feed of Cattle

$$\text{Emission Reduction} = \text{Emissions}_{\text{Baseline}} - \text{Emissions}_{\text{Project}}$$

$$\text{Emissions}_{\text{Baseline}} = \text{Emissions}_{\text{Cattle}} + \text{Emissions}_{\text{Manure}}$$

$$\text{Emissions}_{\text{Project}} = \text{Emissions}_{\text{Cattle}} + \text{Emissions}_{\text{Manure}}$$

- Data Capture
 - Days on Feed
 - Number of cattle in each grouping

Reducing Days on Feed of Cattle

- Questions and Comments
 - Technical issues?
 - Policy concerns?
 - Customization questions?
 - Linkage issues?