

# **FY20 REQUEST FOR CONCEPTS**

#### Direct Request for Concept (RFC) Submissions and Questions to:

RFC@unitedsoybean.org

#### Submission Deadline:

12:00 PM CST, 02/12/2019 (see Figure A for full timeline)

#### **Purpose of the Request for Concepts:**

The United Soybean Board (USB) is seeking concepts for FY20 research and programs for the strategic themes identified in Attachment 2. Invitations for full proposals will be made from the pool of submitted concepts. Creativity and new concepts are also encouraged, including well-justified concepts that may not fit perfectly in priority themes. Inclusion on the strategic priority list does not guarantee that a given theme will be funded.

#### Timeline:

Please see flowchart depicting full proposal timeline (Figure A). In addition, questions may be submitted to <u>RFC@unitedsoybean.org</u>. Questions received by noon CST January 25 will be responded to during an open conference call on Monday, January 28 at 3:00 pm CST (Call in #877-366-0711, Passcode: 30552381#). Only questions submitted in advance via e-mail will be addressed. After the call, questions and responses will be posted on the USB Web site under the Vendor Services tab.

#### **Instructions:**

Concepts should be submitted via e-mail to <u>RFC@unitedsoybean.org</u> in the following format. Lack of adherence to these guidelines may preclude concept review.

- Follow general guidelines in Attachment 1 to respond to strategic themes identified in Attachment 2.
- 2-page maximum
- 11-pt Times New Roman (or equivalent) font
- 1-inch margins
- English language
- Submit as single pdf to <u>RFC@unitedsoybean.org</u> using these naming conventions:
  - submitting organization\_concept\_USBFY20.pdf
  - Example: ContractorName\_HOSOcrudeoil\_USBFY20.pdf

#### Key concept evaluation criteria:

- Potential for U.S. differentiation, value chain disruption or improved flow of information through the value chain
- Market-driven opportunity
- Marketing and/or information dissemination
- Potential and lasting impact
- Partnerships and team
- Clarity and conciseness



#### Attachment 1

United Soybean Board Request for FY20 Concepts

#### **Content requirements for submission:**

#### **Descriptive Stand-Alone Concept Title:**

Contact Information: Organization, Project Lead Name, Address, Phone, Email

**Proposed Duration with start and end date:** (USB FY is Oct 1 to Sept 30 – multi-year proposals are allowable with justification and clear milestones or gates to assess progress over time.)

#### **Budget Estimate:**

Strategic Importance for U.S. Soy: Identify strategic theme targeted (from Attachment 2).

#### **Description of Concept:**

Provide a concise description of the proposed concept.

#### Background:

- Frame the problem or challenge your concept will address. Why is it an opportunity for U.S. soy?
- Why this is the right concept at the right time. Please justify and frame strategic fit with USB FY20 strategic themes (from Attachment 2).
- Provide summary of existing market research or literature review framing the evolution of the opportunity and how it will benefit soybean farmers. Potential near-term (1-3 years) and long-term (5-20 years) benefits to farmers and to the U.S. soy industry should be briefly addressed.
- The potential value and volume size and impact of the opportunity must be addressed in justifying and framing the concept or a plan to collect this information via market assessment built into an early stage of the project. Market-driven approaches are encouraged and should be explained along with potential economic impact.
- For proposals that build on past USB funding, please explain evolution of project, milestones, and iterative process leading to logical next steps proposed.

**Proposed methods:** Please provide a brief explanation of the approach. Describe sufficiently to understand the approach at a high level without disclosing intellectual property.

Lasting impact: How will this project be sustained, scaled and/or commercialized over time?

#### Marketing and/or information dissemination plan:

**Desired project outcomes**: Include SMART goal or goals associated with concept, proposed milestones to measure progress, and key partnerships and enablers of success.

#### Brief description of team capacity:

#### Attachment 2.

#### List of United Soybean Board FY20 Strategic Themes by Target Areas (Meal, Oil, Sustainability)

#### **Overall guidance**

Target areas of meal, oil and sustainability include the following products: Whole soybeans, soybean meal, soy flour, soy hulls, soy protein concentrates, isolated soy protein, textured soy protein, conventional soybean oil and high oleic soybean oil. Sustainability is an attribute of meal and oil. Concepts should target product differentiation, value chain disruption, and approaches with strong long-term potential to create value, maintain or increase market share, and enhance U.S. soy value proposition in key global markets. Priority will be given to proposals demonstrating value chain linkages, partnerships, and inclusion of marketing and communication approaches that enhance U.S. soy reputation and brand in feed and food markets and increase value chain connectivity. Proposals that build long-term value chain resiliency to supply shocks (e.g., drought), and/or demand shocks (e.g., African swine fever, trade disruption) are encouraged. Proposals that intersect and interact with meal, oil and sustainability are also encouraged and should be explained in the concept narrative response.

Creativity and new concepts are also encouraged, including well-justified concepts that may not fit perfectly in priority themes. Inclusion on the list below does not ensure funding of a given theme.

<Please see following pages for themes>

# SUSTAINABILITY

**<u>SUPPLY</u>** (generally associated with soybean production)

- **Develop best management practices to address soybean production issues** (e.g., cover crops, weed and herbicide management, and soil health).
- Find novel sources of genetic resistance for abiotic and biotic stresses of soybean.
- **Ag Data** research/programs are needed to:
  - evaluate existing projects for harmonization to increase returns of checkoff investments in existing FY19 work to increase returns on checkoff investments in coordination with external stakeholders.
  - determine if Ag Data collected via commercial venders is being used effectively by farmers create a plan to improve the use of ag data/metrics on farm.
  - create a plan/approach to address improvements of farmer data collection/legal ownership and rights/security/use/transfer/privacy/communication and sharing between devices, systems, and commercial entities/etc.
  - develop traceability and transparency in the U.S. soybean value chain (e.g., blockchain, artificial intelligence, internet of things (IoT) or other emerging or new technologies), preferably in partnership with multiple supply chain actors.

### MARKETPLACE Programs/Research

- **Infrastructure** research/programs in coordination with stakeholders that support infrastructure (ports, river, rail, roads)
- Increase nutrient and water use efficiency, productivity and profitability in animal agriculture by assessing and targeting animal nutrition and management approaches that include U.S. soybean products
- Increase acceptance and understanding of biotechnology and plant breeding innovation products by providing educational information and materials to influencers.

**<u>DEMAND</u>** (generally associated with soybean end use)

- **Partnerships** Build commercial relationships by connecting farmers to consumer brands:
  - supporting brand sustainability program needs
  - commercial needs determine ways to "close the loop" and employ circular economy concepts that include origination as part of a cycle (commerce, environmental, social) with our end-users and brand customers.
  - o protect and enhance the reputation of U.S. Soy and brand partners

**Communication** – research/programs addressing the following:

- Explore the adoption and use of <u>Sustainable Development Goals (SDGs)</u> to align with program/research work.
- Use existing ag data:
  - o in message/communication development.
  - to determine a definition of sustainability for U.S. Soy (include partners such as the National Corn Growers Association, National Pork Board, U.S. Farmers and Ranchers Alliance).
  - o to our support enhancement of <u>U.S. Soybean Sustainability Assurance Protocol (SSAP)</u>.
- Explore establishment/revision of metrics for sustainability of U.S. soy production (e.g., land use, soil conservation, energy use, water use/quality, biodiversity, etc.)
- Engage (food, feed, and fuel) influencers and include the competitive advantages (e.g., deforestation, human rights) of U.S. Soy.

Materiality – Conduct a complete materiality assessment of U.S. Soy industry.

# OIL

**<u>SUPPLY</u>** (generally associated with U.S. soybean production)

- Assess the value and implications brought on by gene editing and other emerging biotechnologies
- Low oil content beans that provide enhanced nutritional value
- Drought resistant conventional and high oleic soybeans
- Genetic approaches for novel components in soy (must contain marketplace assessment for product concept)

### MARKETPLACE

- Optimize Omega-3 and Omega-6 content beans
- **Novel components** in soy
- Assess **impact of higher oil content meal** (both conventional and high oleic) on enhanced stability feed ingredients and finished poultry/meat/fish products, including economic feasibility and export viability.

**DEMAND** (generally associated with soybean end use)

- Strategic shift to **direct contact end user conversations**, targeting senior personnel at consumer processed goods (CPG) and major food service companies
- Increase **strategic focus of communications** around conventional and high oleic soybean platforms
  - Create a new vision for U.S. soy and use that platform to engage end users directly
  - Identify target customers who value:
    - Sustainable
    - Traceable
    - U.S. Grown
  - Determine CPG and major food service company motivations and the motivation of their customers
  - o Define opportunity through segmentation and measurement
  - o Create demand through prioritization of messaging
  - Define measurement and success criteria
- Create a **food defense platform** (products in both oil and meal)
  - o Prioritize needs
  - Elevate support for the science and enhance targeted work with influencers (e.g., Soy Nutrition Institute)
  - o Focus outputs to drive demand, debunk myths and engage consumers
  - Cultivate key partnerships and alternative high oleic soy platforms (e.g., Calyxt, Missouri Non-GMO)
- Accelerate industrial uses for conventional and high oleic soybean oil
  - o Asphalt
  - o Motor Oil
  - o Surfactants
- Expand original equipment manufacturer (OEM) demand efforts for biodiesel and bioheat
- Create **new use challenge** 
  - E.g., Packaging, Biodegradability, Compostability
- Develop challenge platforms for new uses across the value chain (may cross oil, meal and sustainability)

# MEAL

# **SUPPLY**

- **Enhanced nutrition bundle**: Approaches should target higher value for end users. Priority should be placed on management approaches, wherever possible.
  - High protein priority on protein gains >2% crude protein or unlocking pathways to more valuable amino acid composition for end users
  - o Low or no-processing varieties
  - Carbohydrate composition that could increase utilization or value
  - Increase value through management or breeding approaches that better match speciesspecific nutrient requirements
- Approaches that build or enhance key public-private partnerships and better serve U.S. soybean farmers' long-term outlook through research, management, data science, and increased connectivity through the value chain

## MARKETPLACE

- Research and/or focused technological advancements that increase transparency and traceability, build value, and enable and enhance the flow of information throughout the value chain, especially from end users to upstream market actors
  - E.g., data use and methods standardization, harmonization, or enhancement (e.g., NIR methods), including extension to full quality parameters and digestibility
- Enhance product transformation (processing, transport, storage) to increase value to end users
- Focused aggregation of publicly-available value chain data that establishes U.S. soy as the trusted source and enables or enhances partnerships. Approach should target increased transparency, traceability and/or marketplace disruption, and must have a clearly-defined path to end use, customers, value, and value chain connectivity
- Improve market access for U.S. soy

## **DEMAND**

- **Global animal, aquaculture, and/or human nutrition research** that could differentiate and enhance the value proposition for U.S. soy and soy products and byproducts (e.g., market research, gut health, herd health, pre- and post-biotic effects, carbohydrate fraction, faster growth, impact of early-life nutrition with U.S. SBM on lifetime productivity)
- **Targeted influencer marketing campaigns** that disseminate established animal, aquaculture, and/or human nutrition differentiators in U.S. soy products. Approaches that restore or enhance soy's reputation in food and feed are encouraged
- Marketing and promotion of whole soybeans and soybean meal in key overseas markets for animal and aquaculture feed and/or human food. Aquaculture proposals must assess and/or justify target markets and species with a priority on large current and growth markets in Asia.
- Education, marketing, communication and/or data science that build value for U.S. soy
- Meat, poultry, and/or meal exports
  - Approaches must enable export growth of these value-added products, within justified economic impact and export feasibility relative to whole soybeans
- **High market potential industrial applications** (e.g., adhesives) and others that build on existing work where market opportunities are well-understood and required to increase value of U.S. soy
- U.S. soy potential and approaches to increase consumer and end user preference in **alternative**, **higher-value food and feed markets** (e.g., cellular meat, fermented products, higher digestibility, partnerships with complementary ingredients), including market and technical feasibility studies