

MARKETING PRODUCE

Fruits and vegetables are in high demand in the U.S.

- Demand for produce has increased.
- Produce drives sales for many retailers.
- Local, state, and national programs are trying to increase produce consumption because of the role it plays in preventing chronic diseases, such as obesity, heart disease, and Type 2 diabetes.

Consumer preferences for fruits and vegetables are changing.

- More consumers are seeking out local, organic, and GMO-free produce.
- Many consumers want to purchase produce directly from farmers or through other non-traditional means.

Produce production and marketing is also affected by:

- New growing practices and technology
- Trade agreements, regulations, and policies, like food safety requirements or agricultural guest worker programs
- Disruptions like natural disasters, climate change, and COVID-19

Tracking and responding to these changes is critical.

A team of researchers and Extension educators from 25+ land-grant universities is providing data and tools to help the produce industry make informed decisions now and for the future. Effective marketing improves the industry's profitability and helps consumers choose desirable fruits and vegetables.

Collaboration is key.

Benefits of a multistate approach include:

- Sharing funds and other resources
- Diverse expertise to tackle a wide range of issues across the entire supply chain
- Widespread outreach and impacts





ASSESSING CONSUMER PREFERENCES

Researchers developed accurate methods to measure and predict consumer attitudes toward and willingness to pay for products, including:

- Organic and local fruits, vegetables, wine, and beer
- Blemished produce
- Wine from new growing regions
- New techniques like genetic modification and “Modified Atmosphere Packaging”

Findings have helped the produce industry target consumers and meet their needs.

Studies on the influence of label information have helped create marketing campaigns and programs that actually affect consumer behavior. For example, expiration dates based on safety rather than quality can lead to less food waste, and novel ingredients may be better accepted if consumers are informed about their health benefits or sustainability.

Researchers also examined the effects of certain labels and certifications on international trade and created a model of the impacts of labeling fraud.

ASSESSING MARKETS

Researchers evaluated marketing strategies and determined methods, policies, and organizational structures that yield the best outcomes.

Researchers identified costs and benefits of selling produce in outlets such as farmers’ markets, schools, corner stores, subscription boxes, and agritourism.

Studies identified marketing options that work well for under-served populations, such as Native American and refugee farmers and consumers using federal assistance programs. For example, biweekly pop-up markets selling local fresh produce at a sliding scale have improved food access for low-income communities in Kentucky.

Market performance data and benchmarks of the success and feasibility of various marketing strategies guide decisions by farmers, lenders, and others providing oversight, financing, and assistance.

Research on the effects of market structure and regulations on wine and beer sales helps states consider new policies. For example, after new legislation allowed beer sales in Colorado grocery stores, regional craft brewers successfully entered grocery stores, but their sales declined in liquor stores; small breweries were not able to distribute in grocery stores. In states with fewer restrictions on the retail availability of wine and beer, consumers seek a wider range of wines and beers.

ENCOURAGING NEW TOOLS & PRACTICES

Researchers examined the costs and benefits of adopting various tools and practices. For example:

- Tomato growers in Georgia who adopt control strategies for whiteflies and yellow tomato leaf curl virus have an 85% chance of profiting. At \$8 per box, the expected profit margin is about \$1,900 per acre. At \$9 per box, it increases to \$3,500 per acre.
- Information and training convinced farmers to transition from plastic to biodegradable mulches, which can reduce landfill waste, prevent air pollution, and improve soil.
- Outreach increased the number of farms with food safety certification, which improves access to more profitable markets.

To help farmers make economic assessments, researchers launched a toolkit that has been accessed by over 10,000 users and conducted trainings for over 2,000 stakeholders. In particular, marketing workshops helped 900 farmers and farmers’ market managers set prices for their fresh produce. One year later, 75% had increased their customer base and sales.

Research made policymakers aware of incentives they can offer to increase farmer use of certain practices.

BREEDING NEW FRUITS & VEGGIES

To inform breeding, researchers ranked consumer preferences and farmer priorities for produce like strawberries, grapes, and hops and determined optimal fees and royalties for new patented or trademarked apple varieties.

MITIGATING COVID-19 & OTHER ISSUES

Researchers called attention to the impacts of COVID-19 on the produce industry, including reduced labor supply and sales to restaurants, schools, and hotels. Policymakers used this information to establish credit and debt relief and emergency access to grants and loans. Researchers also tracked changing consumption patterns. Market insights and best practices are shared via a [website](#) with over 14,000 users so far and a [webinar series](#) with over 300 regular participants. Research and outreach help mitigate the impacts of COVID-19 on the industry and consumers.

Estimates of damage due to Hurricane Michael were used to secure disaster relief funds for vegetable growers in Georgia. Other studies examined the effects of wildfires and smoke on the wine industry. Scientists also helped determine fair premiums and contracts for insurance against foodborne illness outbreaks.

Other research evaluated how trade agreements and disputes affect the produce industry and looked at the impact of climate change on trade flows.