

Horticulture Alert

#01 August, 2026

Ethiopia's horticulture sector faces significant challenges due to the Strait of Hormuz closure, leading to fuel shortages, high prices, and operational disruptions. Insights from stakeholder consultations in mid-2026 highlight impacts across the value chain. The Alert recommends immediate actions to address the crisis and sustain sector operations.

Ethiopia

Photo credit: Andualem Tadesse

Alert 1

Disrupted fuel supplies constrain the timely and affordable supply and accessibility of inputs for horticulture production

Alert 2

Disrupted fuel supplies increase horticultural production costs, reducing farmers' profitability and income.

Alert 3

Disrupted fuel supplies hamper irrigation, reducing horticultural crop production and productivity

Alert 4

Disrupted fuel supplies increase postharvest losses of perishable horticultural produce

Alert 5

Disrupted fuel supplies constrain the transport of horticultural produce, limiting market access and increasing transportation costs

Alert 6

Disrupted fuel supplies distort horticultural market prices, increasing price volatility and creating uncertainty for producers, traders, and consumers

Alert 1

Disrupted fuel supplies constrain the timely and affordable supply and accessibility of inputs for horticulture production

What is the impact?

- Fertilizer, seed/seedling and pesticide supply chains are constrained, limiting timely availability, accessibility and affordability for producers; prices for pesticides and vegetable seeds have risen.
- The volume of inputs used in horticultural production is likely to decrease, affecting input types, application rates, total quantities used and application frequency, and resulting in lower productivity.
- Access to farm machinery and equipment is restricted and operating costs are high, delaying farm operations and driving up costs.

What actions are required?

- Consolidate input distribution points closer to farming clusters to reduce the frequency and distance of individual transport trips, making it easier for farmers to purchase and use inputs.
- Arrange purchase of inputs in bulk by cooperatives and farmer organisations to lower prices, and facilitate direct distribution to farmers.
- Encourage the local production, distribution and use of organic fertilizer, compost and biopesticides as an additional or alternative input source.
- Provide effective agricultural advisory services on integrated pest and soil fertility management to reduce dependence on and use of external inputs.
- Distribute strategic reserves of essential inputs, such as seeds, to community-level warehouses ahead of peak planting seasons.

- Promote and strengthen farmer-led seed enterprises, and train local farming groups in quality-declared seed production and marketing.
- Scale up agricultural credit facilities for horticulture producers to ease financial constraints.
- Strengthen incentive schemes, such as tax exemptions, for input suppliers to sustain input supply during the crisis.
- Mandate a fuel quota allocation prioritising major horticultural input suppliers.

Which stakeholders are involved?

- Government: Ministry of Agriculture (MoA) and regional, zonal, and woreda agricultural bureaus (BoAs), Ministry of Trade and Regional Integration (MoTRI) and regional, zonal, and woreda trade bureaus (BoTs), Ministry of Transport and Logistics (MoTL) and regional, zonal, and woreda transport and logistic bureaus (BoTLs), Ethiopian Agricultural Transformation Institute (ATI)
 - Private sector: Ethiopian Horticulture Producers and Exporters Association (EHPEA), Agro-dealers, input suppliers
 - Producer organizations: Cooperatives, Unions and Microfinance Institutions (MFIs)
 - Development partners & NGOs: e.g. SNV, TechnoServe, Agriterra and Wageningen Research Ethiopia
-

Who takes initiative? Who drives action?

- MoA and BoAs
 - Cooperatives
-



Avocado spoilage following disruptions in fuel supplies after loading
Photo credit: Social media (Facebook)



Banana spoilage on the farm due to delayed harvesting resulting from transport disruptions
Photo credit: Akalu Teshome

Alert 2

Disrupted fuel supplies increase horticultural production costs, reducing farmers' profitability and income

What is the impact?

- On the black market, fuel prices have increased more than fivefold; combined with the fuel shortage, this has led to a sharp rise in the costs of irrigation and horticultural production in general.
- Agricultural input prices have risen by 20–30%; e.g. farmers in Arba Minch source banana and tomato seedlings from Debre Zeit, and farmers from Shashemene obtain potato seed from other regions, inputs that have now become more expensive due to higher transport costs.
- Most farmers are abandoning the use of improved seeds and seedlings; some seedling-raising businesses have had to close because they lacked access to fuel and transportation.
- Producers are cutting back on fertilizer use, which is expected to reduce agricultural productivity.
- The cost of tilling the soil with tractors has risen; as a result, farmers are shifting to crops that require less labour and tilling, moving away from horticultural crops, and allocating less land to these crops.
- Some horticulture farms have been abandoned due to lack of fuel; this is reportedly the case for several banana farms in Arba Minch, Zuria.
- The cost of packaging materials such as sacks, bags, boxes and crates has increased.
- Labour costs have risen, since workers' travel expenses and costs of consumables have increased.
- In some areas, disruptions to the horticulture system have created a surplus of labour, leaving agricultural labourers with no income.
- Daily labour contracts are shifting away from fixed daily rates toward output-based payments (e.g. per crate harvested or sorted), transferring a greater share of the sector's risk onto individual workers.
- Reduced agricultural production is tightening food supplies and drives up consumer prices.
- Yields and total production volumes are expected to decline in the coming period because of reduced use of various inputs.
- The income and food security of most farmers is declining.

What actions are required?

- Invest in and accelerate deployment of electric-powered (where electricity is accessible) and solar-powered water pumps, to replace diesel-dependent irrigation.
- Expand cluster-farming initiatives so producers can pool resources and equipment, reduce per-unit input costs and improve production efficiency.
- Organize bulk fuel buying, storage, and distribution for farmers through cooperatives and farmer organizations.

- Decentralise seed and seedling production, distribution and marketing; support private actors to invest in seedling supply chains near production areas.
- Promote efficient use of inputs and good agricultural practices, e.g. optimized use of fertilizers, irrigation and pesticides; promote Integrated Pest Management (IPM) and integrated soil fertility management to lower input costs.
- Promote improved handling and storage practices to reduce post-harvest losses.

Which stakeholders are involved?

- Government: MoA/BoA, Ethiopian Agricultural Authority (EAA), ATI, Agricultural Research Institutes (ARIs)
 - Private sector: EHPEA, Private actors. MFIs
 - Producers organizations: Cooperatives
 - Development partners & NGOs: e.g. SNV, TechnoServe, Wageningen Research Ethiopia
-

Who takes initiative? Who drives action?

- MoA and BoAs
 - EAA
 - MoTRI and BoTs
 - ARIs
-



Roadside aggregation of tomatoes at Mirab Abaya
Photo credit: Akalu Teshome

Alert 3

Disrupted fuel supplies hamper irrigation, reducing horticultural crop production and productivity

What is the impact?

- Fuel shortages hinder crop production by limiting pump and water system operations.
- Normal irrigation schedules have been disrupted, altering water timing, plot rotation, crop-specific intervals, and supplemental irrigation, reducing productivity.
- Farmers are spending time queuing for fuel instead of managing their fields, disrupting day-to-day farm supervision and timely water application.
- Water stress during seedling establishment, flowering, and grain-filling leads to stunted growth, poor quality, reduced productivity, and significant yield losses.
- Black-market fuel prices are rising sharply, severely cutting into or eliminating farmers' profit margins.
- Farmers are increasingly reluctant to grow high-value, water-intensive cash crops and vegetables, shifting instead toward less water consuming and profitable crops.

What actions are required?

- Transition from diesel to solar or electric-powered water pumps.
- Promote microloans for solar-powered technologies, including water pumping and cold storage.
- Establish farmer cooperatives to bulk-purchase fuel during price dips, creating a buffer against short-term shortages and price volatility.
- Promote collective water-pumping schedules among farmers.
- Promote innovations that improve water-use efficiency.
- Advocate for prioritized fuel allocation during key agricultural activities and periods.
- Launch an anti-corruption campaign to address irregularities in the fuel distribution system.

Which stakeholders are involved?

- Government: MoA/BoA, Ministry of water and energy (MoWE) and regional, zonal, and woreda Bureaus of water and energy (BoWEs), ATI, MoTRI and BoTs
- Private sector: EHPEA, Agro-dealers
- Producer organizations: Cooperatives, Unions, MFI,
- Development partners & NGOs: e.g. SNV, TechnoServe, Agriterria, Wageningen Research Ethiopia

Who takes initiative? Who drives action?

- MoA and BoAs
- Cooperatives

Alert 4

Disrupted fuel supplies increase postharvest losses of perishable horticultural produce

What is the impact?

- Transport issues and lack of post-harvest and storage facilities force farmers to discard unsold produce.
- Farmers were compelled to harvest only the largest, most vigorous tomatoes and potatoes, leaving smaller and medium-sized produce unharvested in the field.
- Delayed harvesting causes spoilage, especially for bananas.
- Without adequate local cooling, longer waiting times after harvest increasingly expose produce to heat and mechanical damage during transport, causing significant postharvest losses.
- Lack of cooling and transport delays increase postharvest losses.
- Produce left waiting longer at the farm gate suffers greater losses from sun and rain exposure.
- Transport delays led potato farmers to use the produce as seed due to sprouting and low demand, doubling transport costs as retailers moved stock from Addis market to Jeldu.
- Truck shortages limit transport from remote areas, causing spoilage.
- Delays in reaching consumer markets or agro-processing hubs lead to large volumes of produce going to waste

What actions are required?

- Invest in and promote cooling at kebele and woreda level, such as solar-powered cold rooms and evaporative cooling chambers,.
- Promote investment in postharvest value addition and processing to extend the shelf life of fresh horticultural products.
- Promote proper shade-curing and storage practices to extend shelf life at collection and sorting points.
- Strengthen market linkages and establish a digital marketing system for the horticulture sector to close the information gap between producers and buyers.
- Promote and scale up electric- and solar-powered trucking systems.

Which stakeholders are involved?

- Government: MoA and BoAs, ATI, MoTRI and BoTs, MoTL and BoTLs
- Private sector: EPHEA, farmers market centres, exporters
- Producer organizations: cooperatives, unions
- Development partners & NGOs: e.g. Wageningen Research Ethiopia, TechnoServe, SNV

Who takes initiative? Who drives action?

- MoA and BoAs
- MoTRI and BoTs
- MoTL and BoTLs

Alert 5

Disrupted fuel supplies constrain the transport of horticultural produce, limiting market access and increasing transportation costs

What is the impact?

- Postharvest handling is severely affected; e.g. some drivers make false promises of full fuel tanks, while stopping after only a few kilometres to queue for 2–3 days at fuel stations, risking cargo losses.
- Transport costs have more than doubled compared with the period before the fuel supply disruption.
- Local traders' and aggregators' transport networks have been severely disrupted, due to which collection and supply-chain flow of horticultural produce has been significantly hindered.
- Public transport is scarce and costs more than double or triple the normal tariff, restricting the movement of traders, labourers and extension service providers.
- Truck drivers and owners are increasingly unwilling to transport horticultural commodities.

What actions are required?

- Partner with neighbouring farms or local cooperatives to aggregate and properly store produce before transporting it.
- Develop localised collection, sorting and primary-processing centres closer to production zones.
- Coordinate transport logistics through digital or cooperative dispatch systems.
- Pilot and invest in refrigerated transport for farmer groups, cooperatives and organised producers handling large volumes of perishable produce.
- Deploy digital supply apps to monitor regional fuel distribution transparently and prevent black-market hoarding.
- Coordinate with regional trade authorities to secure daily diesel quotas for time-sensitive perishable crops.

Which stakeholders are involved?

- Government: MoTRI, MoTL, MoA, ATI, ARIs,
- Private sector: Private truck owners, Truck owners association
- Producers organization: Cooperatives and Unions
- Development partners & NGOs: e.g. SNV, TechnoServe and Wageningen Research Ethiopia

Who takes initiative? Who drives action?

- MoTRI and BoTs
- MoTL and BoTLs
- MoA and BoAs

Alert 6

Disrupted fuel supplies distort horticultural market prices, increasing price volatility and creating uncertainty for producers, traders, and consumers

What is the impact?

- Traders and intermediaries are offering producers lower farm-gate prices.
- Retail prices for horticultural crops in non-producing areas have risen, increasing consumer expenditure.
- Higher prices are leading consumers to buy less horticultural produce, reducing their consumption of fruits and vegetables.
- The total distribution of horticultural produce reaching non-producing areas has decreased.
- Fresh produce constrained to reach markets due to its perishable nature.
- Supply chain disruptions limit exporters' access to quality produce.
- Fuel supply disruptions have broken market linkages between value-chain actors, particularly between producing farmers and major urban consumers.
- Fuel supply disruptions have broken market linkages between value chain actors, particularly between producing farmers and major urban consumers.

What actions are required?

- Set up decentralised collection, aggregation and sorting points, with storage for perishable produce, closer to production clusters.
- Encourage local agro-processing (such as pulping and drying) to convert highly perishable fresh produce into shelf-stable products.
- Strengthen contract farming by linking farmers directly to agro-processing parks through pre-planned production agreements.
- Partner with cooperatives to establish storage facilities at local market centres.
- Strengthen market linkages and establish a digital marketing system.

Which stakeholders are involved?

- Government: MoA , MoTL and BoAs, MoT and BoT, ATI
- Private sectors: Farmers market centres
- Producers organization: Cooperatives and Unions
- Development partners and NGOs:e.g. SNV, TechnoServe and Wageningen Research Ethiopia

Who takes initiative? Who drives action?

- ATI
- MoA and BoAs
- MoT and BoTs
- Cooperatives

Dashboard

Impact of the Strait of Hormuz closure Ethiopia's horticulture sector.

(Outcomes of rapid assessment was carried out in July/August 2026)

- Severe negative impact
- Negative impact
- Slight negative impact
- No impact; business as usual

Details	Impact	Alert
Input supply & finance		
Seed/seedling supply (availability, access, timeliness, cost and use)	■	Alert 1, 2
Fertilizer supply (availability, access, timeliness, cost and use)	■	Alert 1, 2
Pesticide supply (availability, access, timeliness, cost and use)	■	Alert 1, 2
Irrigation and other farm equipment supply (availability, access, timeliness, costs)	■	
Packing and other material supply	■	
Fuel supply and price affecting irrigation schedules and irrigated crop production (availability, timeliness and cost)	■	Alert 3
Access to and availability of cash for farmers to pre-finance production	■	
Expected quantity of inputs to be used in the coming production period	■	Alert 1, 2
Production		
Use of agricultural inputs (type, rate, amount and frequency)	■	Alert 1, 2
Extension and advisory services delivery	■	
Labour supply and demand	■	
Labour cost	■	Alert 2
Overall production costs	■	Alert 2
Harvesting schedules	■	Alert 2, 3
Harvested quantities – most recent harvest period	■	Alert 2, 3
Expected harvested quantities – next harvest period	■	
Expected planted acreage for agricultural crops in the next season	■	
Expected quantity and quality of produce to be harvested in the coming period/season	■	Alert 2, 3
Post-harvest		
Farm-level losses	■	Alert 1, 3
Post-harvest practices and operations	■	Alert 4
Storage losses	■	
Use of storage facilities (cold rooms/cold stores)	■	
Use of ripening facilities (banana/avocado)	■	
Sorting and grading	■	
Post-harvest losses after produce is loaded onto trucks	■	Alert 4
Transport & logistics		
Access to and availability of transport services	■	Alert 5
Delivery time of agricultural commodities	■	Alert 5
Transportation costs (freight, local and international)	■	Alert 5
Transport of packing and other materials (e.g. crates, boxes and cartons)	■	
Transport from regional distribution centres to central/export markets	■	Alert 5
Mobility of traders and collection/aggregation of agricultural commodities	■	Alert 5
Interest of truck drivers in transporting agricultural commodities	■	Alert 5
Information sharing among logistics-sector stakeholders	■	
Coordination among logistics-sector stakeholders	■	
Alignment of existing strategies among logistics-sector stakeholders	■	

- Severe negative impact
- Negative impact
- Slight negative impact
- No impact; business as usual

Details	Impact	Alert
Distribution & market access		
Accessibility/availability of agricultural crops at distribution centres	■	Alert 5, 6
Supply consistency	■	Alert 5, 6
Availability and use of storage facilities	■	
Day-to-day activities of workers at distribution centres, unions and cooperatives	■	Alert 4, 5, 6
Supply volumes	■	Alert 5, 6
Access to domestic markets	■	Alert 5, 6
Access to regional export markets	■	Alert 5, 6
Access to international export markets	■	
Trade & marketing		
Sales volumes	■	Alert 6
Market prices	■	Alert 6
Farm-gate prices	■	Alert 6
Crop prices across consumer categories	■	Alert 6
Food & income security		
Household consumption of crops	■	Alert 6
Expected farm-household income generation and food security in the coming period	■	Alert 6
Expected national food and income security in the coming period	■	

Horticulture alert & supply chain assessment

Ethiopia's horticulture sector faces significant challenges due to the Strait of Hormuz closure, leading to fuel shortages, high prices, and operational disruptions. The Ethiopian Ministry of Trade and Regional Integration reported that fuel delivery disruptions exceeding 180,000 tons in March reduced the national daily diesel supply by more than half, from 9.2 million to 4.5 million litres. This supply shortage contributed to a 26 percent increase in fuel prices, from 129 Ethiopian Birr (ETB) in December 2025 to 163 ETB by April 2026.

The resulting fuel scarcity has severely disrupted essential agricultural operations and constrained critical transportation networks, limiting the movement of fresh agricultural produce from production areas to markets. Consequently, the disruption poses significant challenges to agrologistics, contributing to sharp food price inflation, thereby threatening Ethiopia's food security in both the short and medium term.

Without robust mitigation strategies and timely interventions by the authorities and sector stakeholders, prolonged fuel supply disruptions could further undermine agricultural productivity, market access, and the resilience of Ethiopia's food supply systems.

Methodology

The horticulture alert evaluates the challenges in Ethiopia's horticulture sector due to the Strait of Hormuz crisis, focusing on fuel shortages, rising fuel prices, and disruptions in operations. The study uses a rapid assessment method developed by Wageningen University

& Research (WCDI, 2021)¹. The rapid sector assessment tool was designed primarily to rapidly assess the impact of shocks on agricultural sectors. The tool reveals what impacts are most pressing, creates awareness, brings stakeholders together to identify and prioritize actions, provides validated evidence to guide these actions, and advocates for policy measures to respond to the shocks.

This rapid assessment was carried out in July/August 2026 under the RAISE-FS LOGIC programme. The conducted survey included 75 respondents covering 8 stakeholder groups, and comprising 32 farmers (43%), 10 input suppliers (13%), 7 traders (9%), 16 government representatives at woreda, regional, and federal levels (21%), 4 transporters (5%), 2 processors (3%), 2 cold chain service providers (3%), and 2 value chain supporters (3%).

Contributing organizations

The 'Horticulture Alert Ethiopia' initiative included input from organizations such as the MoA (Horticultural Directorate), ATI, SNV, Flying Swans, EHPEA, Ethiopian Trading and Business Corporation, regional BoAs (Oromia, Sidama, South Ethiopia), Hawassa University, Sidama Avocado Development Program, South Ethiopia Agricultural Institute, Arba Minch Agricultural Research Centre, Woreda Agriculture Offices (Shashemen, Dale, Mirab Abaya), farmers (smallholder and commercial), wholesalers, retailers, Woreda Trade Offices, and input suppliers from Hawassa.

¹ WCDI (2021). Rapid Sector Assessment: an adaptive tool to manage agricultural sectors. Wageningen University & Research, December 2021

Responsible team Stichting Wageningen Research Ethiopia: Akalu Teshome, Bereket Dindamo, Legesse Abate, Agdew Bekele, Asfaw Zewdu, Geremew Tefera and Dawit Alemu

Responsible team EHPEA: Tewodros Zewdie and Wale Getaneh

Responsible team WUR/WSER: Edwin van der Maden, Herman Snel and Irene Koomen

Citation:

Horticulture Alert #01 (September, 2026). Stichting Wageningen Research Ethiopia, Addis Ababa. SWRE-RAISE-FS-26-063

This issue brief can be downloaded for free at <https://doi.org/10.18174/725367>

© 2026 Stichting Wageningen Research Ethiopia. P.O. Box 88, 6700 AB Wageningen, The Netherlands



Stichting Wageningen Research uses a Creative Commons Attribution 4.0 (Netherlands) licence for its reports.

For more information, please contact either:

Dawit Alemu
Stichting Wageningen Research - Ethiopia
dawit.alemu@wur.nl

Edwin van der Maden
Wageningen Social & Economic Research
edwin.vandermaden@wur.nl

www.raise-fs.org