

**UN JOINT PROGRAMME EUROPEAN UNION INNOVATIVE ACTION FOR
PRIVATE SECTOR COMPETITIVENESS IN GEORGIA (EU IPSC)
ANNUAL PROGRAMME NARRATIVE PROGRESS REPORT
REPORTING PERIOD: 1 JANUARY – 31 DECEMBER 2021**

<p align="center">Programme Title & Project Number</p> <p>Programme Title: UN Joint Programme European Union Innovative Action for Private Sector Competitiveness in Georgia (EU IPSC) Programme Number ENI/2018/401-351</p> <ul style="list-style-type: none"> MPTF Office Project Reference Number: 00114145 	<p align="center">Country, Locality(s), Priority Area(s) / Strategic Results</p> <p><i>Country/Region: Georgia/Kakheti and Imereti</i></p> <p><i>Priority area/ strategic results</i> <i>Business sophistication, innovation and entrepreneurship</i></p>								
<p align="center">Participating Organization(s)</p> <ul style="list-style-type: none"> Organizations that have received direct funding from the MPTF Office under this programme <p><i>UNDP, UN FAO, IOM and UNIDO</i></p>	<p align="center">Implementing Partners</p> <p>National counterparts (government, private, NGOs & others) and other International Organizations</p> <p>Ministry of Economic and Sustainable Development (MoESD) and its agencies Enterprise Georgia, Georgian Innovations and Technology Agency, the Ministry of Environmental Protection and Agriculture and its agency Scientific Research Centre and the Diaspora Relations Department Ministry of Foreign Affairs.</p>								
<p align="center">Programme/Project Cost (US\$)</p> <ul style="list-style-type: none"> Total approved budget as per project document: <p>Agency Contribution (<i>by Agency</i>)</p> <ul style="list-style-type: none"> EU USD 5,693,500 UNDP USD 80,000 FAO USD 50,000 UNIDO USD 20,000 <p>TOTAL: USD 5,843,500</p> <p>Programme Assessment/Review/Mid-Term Eval. – NA</p>	<p align="center">Programme Duration</p> <table border="1"> <tr> <td>Overall Duration (<i>months</i>)</td><td>4 Years</td></tr> <tr> <td>Start Date: (<i>dd.mm.yyyy</i>)</td><td>1 February 2019</td></tr> <tr> <td>Original End Date (<i>dd.mm.yyyy</i>)</td><td>31 January 2023</td></tr> <tr> <td>Current End date (<i>dd.mm.yyyy</i>)</td><td>31 July 2023</td></tr> </table>	Overall Duration (<i>months</i>)	4 Years	Start Date: (<i>dd.mm.yyyy</i>)	1 February 2019	Original End Date (<i>dd.mm.yyyy</i>)	31 January 2023	Current End date (<i>dd.mm.yyyy</i>)	31 July 2023
Overall Duration (<i>months</i>)	4 Years								
Start Date: (<i>dd.mm.yyyy</i>)	1 February 2019								
Original End Date (<i>dd.mm.yyyy</i>)	31 January 2023								
Current End date (<i>dd.mm.yyyy</i>)	31 July 2023								
	<p align="center">Report Submitted By</p> <ul style="list-style-type: none"> Name: George Nanobashvili Title: Economic Development Team Leader Participating Organization (Lead): UNDP Email address: george.nanobashvili@undp.org 								

LIST OF ABBREVIATIONS

RDA	Rural Development Agency
CAC	Conformitas Agraria Communitatis
CMO	Cluster Management Organization
CMT	Cluster Management Team
DCFTA	Deep and Comprehensive Free Trade Agreement
EPR	Extended producer responsibility
EU	European Union
FAO	Food and Agriculture Organization of the United Nations
GEOSSA	Georgian Seeds and Saplings Association
GFA	Georgian Farmers' Association
IOM	International Organization for Migration
ISF	International Seed Federation
MEPA	Ministry of Environmental Protection and Agriculture
MoESD	Ministry of Economic and Sustainable Development
NFA	National Food Agency
SRCA	Scientific Research Centre of Agriculture
SLA	State Laboratory of Agriculture
PRO	Producer Responsibility Organization
UNDP	United Nations Development Programme Georgia
UNIDO	United Nations Industrial Development Organization
PMAG	Packaging Manufacturers' Association of Georgia

EXECUTIVE SUMMARY

The reporting period covers the third year (2021) of the UN Joint Project. UN agencies performed activities to strengthen the overall competitiveness of the Georgian private sector through cluster development means that will be translated into the impact of promoting the market-oriented and innovative business models for job creation and greater business sophistication in the long-term.

In the reporting period, intending to strengthen the capabilities of developing and operating local clusters, UNIDO has conducted initially agreed five cluster diagnostic studies (each the first-of-its-kind): 1) Toys production (Tbilisi), 2) Jewellery (Tbilisi), 3) Fruit and vegetable processing cluster with a focus on hazelnuts (Guria), 4) Poultry (Kvemo Kartli) and 5) Wine (Kakheti). Upon request of the Ministry of Environmental Protection and Agriculture (MEPA), UNIDO has conducted an additional cluster diagnostic study for the Greenhouses in the Imereti region.

UNDP further supported the packaging clusters in Kakheti, Imereti regions and Tbilisi area through various instruments: needs assessments, strategic development planning, capacity development and enhancing entrepreneurship applying consultancy, coaching, sector-specific initiatives, advocating and implementing research and data-driven decision-making, facilitating and promoting local and international partnerships, supporting companies directly with strategic investments to address key bottlenecks and direct engagement with various actors and application of environmentally friendly packaging and packaging production. This assistance resulted in strengthened capacities of policy-makers and other stakeholders in identifying and developing clusters, positioning of the packaging cluster as a pioneer in the application of efficient and effective practices.

The packaging cluster formed through the PMAG Packaging Cluster initiative (under the Packaging Manufacturers Association of Georgia, hereafter PMAG) has been strengthened, and its managerial capacity, membership and regional coverage were broadened within 2021 through project support. UNDP widened the cluster's scope of operations, commencing new initiatives to integrate companies and expanding membership and regional reach. Members benefited from PMAG efforts on mitigating the negative effects of the COVID-19 pandemic on cluster members and the packaging value chain in general having access to industry knowledge and networks and being able to leverage collaborative efforts and be on the cutting edge of the industry. In 2021, membership in the Packaging Cluster increased significantly and reached 92 members (up from 37 members in 2020).

The role of FAO, as one of the implementing partners of the European Union Innovative Action for Private Sector Competitiveness project in Georgia (EU IPSC), has been to help to develop the fruit sector in a way to make it more competitive and compliant with European standards, starting with the certification of locally produced planting material. FAO has approached this task from the state, non-governmental and private sectors sides.

FAO further contributed to creating a qualification and certification system for sapling producer nurseries. The relevant ministries and local agencies in the agriculture sphere actively cooperated with FAO to develop and operate clusters to organize collective support mechanisms. This assistance resulted in the following outcomes: developing a national seedling certification system, strengthening technical support to nurseries, and creating the seed and sapling association (cluster management organization (CMO)).

Based on the requirements of the EU-Georgia Association Agreement, FAO laid groundworks for a CAC (Conformitas Agraria Communitatis) qualification system to become mandatory. To ensure effective enforcement and execution of the program, FAO has supported MEPA, SRCA, NFA and LMA (Laboratory of the Ministry of Agriculture) by training their specialists to enhance their professional capabilities needed for nursery inspections, and capacity development of nurseries, issuance of certificates and other respective responsibilities. FAO supports the saplings and seeds sector through the Georgian Seeds and Saplings Association (hereby referred to as ‘the Association’ or ‘GEOSSA’), created in January 2021 with the support of the project from the non-governmental side. Awareness-raising and promotional activities to inform cluster stakeholders about the upcoming regulation, CAC standard and the certification system are among the FAO’s activities.

In the reporting period, IOM established the register of 2640 individual diaspora profiles, structured by geography, professional field of activity, job position, business and/or institution of affiliation and contact information (email, LinkedIn, social media). Two diaspora economic forums were organized. The diaspora economic forums, engaging diaspora professionals in the clusters’ development process, B2B networking indirectly influenced the outcome indicators, such as those related to turnover and export. IOM further contributed to achieving enhanced entrepreneurship and business sophistication by engaging local, international partners and Georgian diaspora and implementing follow-up surveys and/or supporting the temporary assignment of qualified diaspora for CMOs and member businesses. To achieve joint results, IOM cooperated with the FAO and Seeds and Seedlings and Packaging CMO, UNDP and Packaging CMO, by supporting the diaspora temporary assignments and supporting the B2B networking.

The detailed performance annual reports for each program, UNIDO, UNDP, FAO, and IOM are presented as separate annexes¹.

¹Annex 1: UNDP Detailed Actions Performance 2021
Annex 2: FAO Detailed Actions Performance 2021
Annex 3: IOM Detailed Actions Performance 2021
Annex 4: UNIDO Detailed Actions Performance 2021

I. Purpose

The JP aims to Enhance entrepreneurship and business sophistication by strengthening the capacities of government and local entities to develop and operate clusters and supporting companies directly with strategic investments while also demonstrating the effectiveness of these strategies to businesses. The participating UN Agencies will work to realize the four key results/outputs in order to reach this outcome.

1. Strengthened capacities of policymakers to identify clusters and support the establishment of SME clusters (Implementor UNIDO).
2. Developed pilot clusters for the two sectors of packaging and seeds/seedlings through the support of cluster management organizations (Implementor: UNDP Georgia – Packaging, FAO – Seeds/Seedlings).
3. Development and support of strategic investments in companies deemed necessary to improve the cluster. (Implementor: UNDP Georgia).
4. To enhance the ability of national and local-level institutions and businesses to identify and connect with diaspora for the purpose of sector development, skill transfer and financing. (Implementor: IOM).

In order to achieve the above-mentioned outcomes, by addressing the Georgian economy's low levels of entrepreneurship, business skills, local production, poor diversification, and limited trade opportunities the JP facilitates the 'cluster' development to improve value chain efficiency and collaboration, providing strategic investments to individual businesses, and reaching out to the Georgian diaspora as an underutilized business development resource. This is accomplished by collaborating at the institutional, sectoral, geographical, and individual business levels.

The JP interventions will have a holistic impact on private sector development in the country by developing a framework for cluster policy, testing pilots for cluster support through Cluster Management Organizations and individual company support through strategic investments, and better integrating the Georgian diaspora into the process. Consequently, JP is in line with the Strategic UN Planning Framework (e.g., UNDAF).

II. Results

i) Narrative Section

The joint actions of UNIDO, UNDP, FAO and IOM contributed to proceeding to achieve the outcome of enhancing entrepreneurship and business sophistication by strengthening the capacities of government and local entities to develop and operate clusters and supporting companies directly with strategic investments while also demonstrating the effectiveness of these strategies to businesses. The changes and results attained stem from the activities facilitated and planned by these programs. The output level changes with the reference to the indicators are presented below for each program.

1. Progress on outcome indicators

Outcome: Enhance entrepreneurship and business sophistication by strengthening the capacities of government and local entities to develop and operate clusters and supporting companies directly with strategic investments while also demonstrating the effectiveness of these strategies to businesses.

Indicator 1. *# Of identified potential clusters (Tbilisi, Kakheti and Imereti) (baseline – 0, target by 2022 – 10)* was fully achieved. In total 11 clusters were identified, UNIDO identified 9 clusters and implemented specific activities in two of them. Furthermore, two clusters in the packaging sector (UNDP) and the seeds/seedlings sector (FAO) were identified initially.

Significantly, in this regard, for consecutive years, UNDP plans to go beyond the packaging sector and conduct diagnostics and identification of potential clusters for the other related sectors that will serve as the reasonable development of the packaging sector activities. These interventions will be based on the experience gained through the previous years in the packaging sector and contribute to the curing two major areas for the export products – organizing the export processes, for instance, formalizing logistical matters; and secondly, guaranteeing the quality of the product, relevant to the international requirements, before packaging processes start.

Indicator 2. *The growth rate of selected clusters' members' turnover (baseline – 2018 output data, target by 2022 – 20% growth)* was achieved fully as for the UNDP PMAG cluster, the average turnover for cluster member companies for 2021 increased by 53.8% compared to 2018.

Indicator 2. *Balance of trade in selected sectors (baseline – 2018 output data, target by 2022 – 10% improvement (higher exports or lower imports)).* The trade balance for 2021 for packaging together was negative \$(-135.7) million as opposed to \$(-110.4) million in 2018. In 2021, the exports for the packaging sector increased by \$9.6 million compared to 2018; Simultaneously, the imports also increased by \$34.8 million compared to the baseline. Overall, the balance of trade deteriorated by 22.9 % in 2021 compared to 2018.

2. Strengthened capacities of policymakers and other stakeholders to identify and develop clusters (UNIDO):

At the Outcome level, one of the *indicators* is *the number of identified potential clusters (baseline – 0, target by 2022 – 10)*. UNIDO identified 57 *emerging and potential clusters* in manufacturing, agribusiness, and primary agriculture in 2019 and validated findings in 2020, thus, successfully *reaching one of three major indicators of the UNJP*. Even though UNIDO did not commit to contributing directly to the achievement of other Outcome level indicators, as UNIDO is supporting two clusters (Marine fishing and pharmaceutical clusters), positive results of cluster-

level interventions toward other Outcome level indicators can only be observed and measured by the end of 2022/beginning of 2023.

3. Development and functioning of the clustering approach in the packaging and seeds/seedlings sectors:

a. Packaging Sector (UNDP):

In the third year of the project, based on in-cluster cooperation and networking, the CMO adopted measures to direct the planning, implementation, daily management, and coordination of activities and services of PMAG and allowed it to execute its role. Simultaneously, UNDP has further studied and analysed the needs of the sector companies and responded to them as all the activities are carried out according to them.

Despite the COVID pandemic related challenges the packaging cluster keeps dynamic development., By the end of 2021, 1,506 companies are registered, out of which about 52% (778) are economically active. The sector is dominated by the small-sized companies accounting for more than 95% of the active companies, followed by medium-sized ones with 3%. As for the regional coverage, the focus regions of Tbilisi, Imereti and Kakheti unite 625 active companies. The rest are mostly scattered in Adjara (4.9%), Kvemo Kartli (4.7%), Shida Kartli (3.9%) and Samegrelo Zemo Svaneti (2.3%) regions. These numbers indicate that the pool of potential members of the PMAG packaging cluster is large and covers almost the whole country.

Tracking the outcome indicators, we observe the following trend: the **balance of foreign trade in packaging products** deteriorated by approximately 16% in 2021 compared to 2020. In 2021, the total value of imported packaging products was US\$164.32 million. This number is 25% higher than in 2020. As for the total export figures for packaging materials, those products together reached US\$28.61 million in 2021. This is 64% higher than in 2020 (US\$17.44 million). The trade balance for 2021 for packaging together was negative \$135.7 million.

The UNDP project team focused on addressing the identified needs of the cluster companies strengthening PMAG and member capacities, expanding membership, increasing regional outreach, and constantly checking on the challenges and expectations of packaging-sector companies. With the overall aim of helping cluster management organizations and member companies in the packaging value chain in Georgia become more innovative and aware of their potential, **UNDP has:**

- Continued **developing capacities of PMAG** to institutionalize and reinforce its cluster management functions;
- Initiated **scanning environmental practices in packaging supply chains** for PMAG members;

- **Facilitated sharing experiences and best practices** by organizing workshops and trainings;
- **Enhanced entrepreneurship and business sophistication** by supporting implementing research and analysis in specific areas related to the packaging industry;
- Facilitated a series of meetings and trainings for **the CMO capacity building and contributed to increasing the competitive advantage of the PMAG cluster member companies**;
- **Supported PMAG to establish partnerships and cooperation** with their local and international counterparts, lay grounds for strong networking;
- Initiated energy refining business processes, improving occupational safety, and decreasing discriminatory practices.

PMAG Packaging Cluster prioritized strengthening market positions, applying good business models, promoting environmentally friendly approaches, making technological advancements, and entering new markets. UNDP's support for services development has increased interest in the cluster, thereby expanding its sustainability and potential to benefit the sector.

The PMAG Packaging cluster **improved networking, coaching and business diagnostics** (via a mixture of remote online and offline meetings due to the pandemic). The effective implementation of collaborative projects within the packaging cluster and increasing their capacity/competitiveness were facilitated by Strategic development services and various thematic consultations provided to PMAG member companies involved in the activities, which were critical in establishing a cluster management mechanism. As a result, companies involved began to recognize the importance of the sector's medium- and long-term perspectives and quick returns. With a few exceptions, new members are aware of the cluster's additional value through their benefits, not always through the broader sector impact. As a result, the functioning of the clustering approach in the packaging and seeds/seedlings sectors was reinforced. **UNDP Actions that were commenced (and that will be continued next year) in the packaging sector include:**

- Generating evidence and studies, trainings, mentorships, and expanding networking and sharing best international practice to address common needs.
- Periodically assessing the needs of the local member suppliers and end-users of the packaging and adopting the policies and processes.
- Implementing capacity development programmes for managerial and production-level staff.
- Performing analysis and laying grounds to legislative approximation with EU in packaging and packaging materials sector.
- Taking measures to improve the labour supply and trainings on DCFTA requirements.
- Assisting packaging value chain companies in increasing sales, boosting employment, and improving production quality.
- Supporting improving operational standards

- Supporting member companies in access to finance

The COVID-19 pandemic was a major challenge for the young cluster. It influenced the pace of the cluster's network growth in the past 12 months. Nevertheless, the CMO team convinced companies and business support organizations to participate in meetings, training sessions and workshops. Also, individual audits and company support were provided. The team is also engaged in the grant program initiated by UNDP to support modernization investments in companies in the packaging value chain.

The PMAG Packaging Cluster as the World Packaging Organisation member, uses this opportunity to deliver exclusive training on advanced packaging technologies and circularity, an extremely rare case for newly joined members. The cluster is registered on the European Cluster Collaboration Platform and has attained the ECEI BRONZE Label.

The UNDP initiative “scanning environmental performance practices” for the member companies aimed at laying grounds for the impact on the environment and developing competencies for the sustainable competitiveness of the cluster member companies. This initiative took off in 2021 and is ongoing. UNDP joint action of Energy efficiency audit practices for packaging cluster companies identified cost-effective investments in energy efficiency practices to save energy by refining processes, activities, and measures, and reducing energy consumption through the support of energy-efficient technologies is one of the key tasks of sustainable development and is in line with the EU actions and Georgia's state strategy for promoting energy efficiency. The energy efficiency audit is an ongoing project to be implemented during 2022 for cluster member companies.

UNDP supported packaging cluster member companies in following the EU and local legislation to study the enterprise's current state of occupational safety risk². The Audit for work processes, existing documentation, and occupational management systems were made for 10 cluster member companies (Tbilisi, Kakheti, and Imereti Regions). A consolidated report submitted contributed to compliance with the legal framework of labour safety according to Georgia, and international best practices and, overall, endowed the business sophistication. Also, directions for corrections and improvements of violations for companies were incorporated.

UNDP supported PMAG in developing a youth internship to support the first job placement³ in cooperation with partner universities in 2020 and continued within 2021. The internship project helped the member companies overcome the human resources shortage and labour market skills mismatch problems, thus strengthening the overall competitive position of domestic packaging companies and securing compliance with environmental protection standards. PMAG employed 18 students within the internship programs in 3 different regions of Georgia (Tbilisi, Kakheti, Imereti). 160 internship interviews were conducted, and 10 partner universities participated in the

² Annex 5: UNDP Occupational Safety Audit

³ Annex 6: UNDP Internship Project Report

program. By 2021, 3 interns had been employed, and their contracts were extended. Of these 3 signing employer companies, 2 is the PMAG cluster member.

UNDP strengthened the PMAG packaging cluster by raising the cluster's awareness of the many challenges packaging companies face in Georgia. The new coronavirus has doubled the pace of digital transformation. Thus, UNDP implemented and facilitated conducting research studies enhancing e-commerce and entrepreneurship by supporting companies with strategic investments to keep pace with the recent, fast pandemic-related economic developments. In response, UNDP proposed **developing knowledge products** as a steppingstone to the solution of introducing and sophisticating business processes for the PMAG member companies as well as developing cluster approach. These products envelope:

- Assessing the feasibility of introducing a sales Channel stimulation study (Part 1)⁴⁵ and Sales Channel Stimulation Study Part 2⁶. The study is the initiation for strengthening the sales maturity analysis.
- The study of the manufacturers⁷⁸ and end-users of the packaging materials⁹¹⁰ covered the entire value chain in the packaging sector, informing the PMAG members about the challenges existing in the sector and allowing them to incorporate updated strategies accordingly.
- The study of the Market of Packaging Materials¹¹. The study allowed to draw the big picture about the recent tendencies of the sector and plan the strategic directions accordingly.
- The survey of plastic and biodegradable bag manufacturers¹². As a response to banning the import and sales of plastic bags in Georgia, the survey spotlighted changes in the production process and their impact on productivity, demand, and jobs; it allowed identifying the complexity of the certification process and analyzing their needs/challenges, thus enabling PMAG to form strategic decisions in this regard to strengthen the overall need competitiveness of domestic packaging companies.
- Legislative Approximation with EU in Packaging Sector Presentation¹³ informed representatives of the private sector, business associations, clusters and other stakeholders on the planned changes in legislation, including representatives of the relevant sectors in the process of drafting, thus prepared the foundation for the possibility to participate facilitated ensuring communication and dialogue with responsible governmental entities, packaging sector representatives and other stakeholders.

⁴ Annex 7: UNDP Sales Channel Stimulation Study Part 1

⁵ Annex 8: UNDP Sales Channel Stimulation Study Part 1 Presentation

⁶ Annex 9: UNDP Sales Channel Stimulation Study Part 2

⁷ Annex 10: UNDP Packaging Materials Manufacturers Study

⁸ Annex 11: UNDP Packaging Materials Manufacturers Study Presentation

⁹ Annex 12: UNDP Packaging Materials end Users Study

¹⁰ Annex 13: UNDP Packaging Materials end Users Study Presentation

¹¹ Annex 14: UNDP Study of the Market of Packaging Materials

¹² Annex 15: UNDP The Survey of Plastic and Biodegradable Bags Manufacturers Presentation

¹³ Annex 16: UNDP Legislative Approximation with EU in Packaging Sector Study Presentation

- The qualitative study report on green/processing sector diagnostics¹⁴ was conducted to make the cluster support more to the green companies and depict the core obstacles in this regard. The study serves as the fundamentals for achieving more manufacturer extended commitment (MW). The study revealed:
 - *The need for awareness-raising. In the packaging sector, one of the high spending shares comes from the waste transportation part. Optimizing processes and proper planning will help save on transportation costs.*
 - *The need for creating synergies within companies - to strengthen the links between waste generators and companies involved in management, it is necessary to hold mutually beneficial measures.*
 - *In terms of advocacy with the state, an important issue is to encourage recycling through subsidy and simplification of bureaucratic procedures.*

UNDP has been building capacities of packaging cluster member organizations and companies by conducting training, mentoring and study tours on various topics, simultaneously engaging other stakeholders in the processes and thus strengthening the capacities of policy-makers and other stakeholders to develop clusters. The training needs of the PMAG cluster member companies were assessed beforehand the training schedules were planned for 2021. Considering the preferences and emphasis on the training needs, UNDP, in cooperation with PMAG, facilitated and implemented these training modules to contribute to achieving the outcome of sophisticating business processes:

1. *Lean Management principles for day-to-day operations* – cluster members transformed their company processes into a more efficient production, reducing the losses and introducing innovative approaches. Instead of holding total control of work processes and keeping the spotlight, Lean management encourages shared responsibility and shared leadership.
2. *Business model transformations* – group training and individual coaching strengthened the member companies' capacity to transform business models.
3. *The sales Stimulation module* developed the skills needed for sales in local enterprises and promoted the successful implementation of the enterprise sales strategy.
4. *Social media management* - to respond to COVID19 pandemic-related challenges and communicate effectively in both the B2B and B2C markets.
5. *Packaging Technology and Circular Economy¹⁵* - In keeping pace with the global developments, becoming environmentally safe and filling the gap in the understanding of the term “sustainable packaging”, the role of clustering is gaining more and more importance. The training was conducted in partnership with World Packaging Organization exclusively for PMAG, an extremely rare occasion for new member organizations.

¹⁴ Annex 17: UNDP Qualitative Study Report on Green / Processing Sector Diagnostics

¹⁵ Annex 18: UNDP Packaging Technology and Circular Economy Guidebook

6. *Amendments to the Labour Code of Georgia* Companies developed action plans to increase occupational safety, decrease discriminatory practices, and distribute the remuneration according to the code.
7. *Occupational safety system and management* training was conducted within the framework of a memorandum signed between the Georgian Waste Management Association (GWMA) and the PMAG. The training provided professional practical advice to the companies involved from occupational safety experts. The knowledge gained during the training will help companies to organize labour safety and conduct activities provided by law.

UNDP's partnership with PMAG helped the cluster management organization expand and build its linkages responding to the outcome through UNDP aiming to develop and function the clustering approach in the packaging (outcome 2 level). Many companies deem the domestic market saturated, with little potential for growth. However, PMAG sees opportunities to bring together actors in the packaging value chain to exploit better new opportunities in customer segments that were previously unaddressed due to the lack of joint initiatives. PMAG initiated and stimulated networking with representatives from downstream industries in the Imereti and the Kakheti regions.

Additional efforts and changes to develop the clustering approach were made towards exploring opportunities in the Black Sea, Caspian Sea, and Gulf regions. PMAG Packaging Cluster Strategy actions taken in 2021 aided in increasing the presence of domestic packaging companies in international markets. The international fairs' participation allowed PMAG packaging companies to acknowledge the latest technological achievements in the packaging sector - filling the informational gap caused by the pandemic, developing and strengthening international networks, and thus maintaining competitiveness through access to machinery, that is translating indirectly into the sales-boosting. The international fairs PMAG Packing Cluster visited and participated in are as follows:

- *The Eurasia Packaging Fair, Turkey ASD (Turkish Associate Manufacturers Association) and PMAG have formed a partnership through this fair. Several thematic initiatives are currently under consideration. The parties devised strategies for organizing green events and exchanging expertise.*
- *The International Exhibition, The Green Technology Expo "ECOMONDO 2021" in Rimini, Italy.*
- *„FachPack 2021“, Nuremberg, Germany.*
- *The New Year's Fair was held at Expo Georgia, Tbilisi*

UNDP supported and promoted forming partnership approaches and formal cooperation with various bodies in Georgia to strengthen the strategy implementation process and keep pace with the sector's local and global developments. Within the Memorandums of Understanding (MoUs) framework, the organizations agreed to cooperate actively towards the projects of common interest, exchange of information on the labour market, packaging and other

supporting sector needs, and organization of joint educational events. The MoUs cover different directions and envelope diverse partnerships:

Partnerships were developed to identify challenges in formal and non-formal education and employment, solve problems, and introduce new initiatives and competencies development of the PMAG member companies. MoUs were signed with Education Development and Employment Center (EDEC), Export Development Association, Imereti Scientists Union SPECTRI, Swiss Business Association, VET college "Iberia", the Georgian Laboratories Association, Georgian Waste Management Association, Kudos Georgia, Imereti Agrozone, Kutaisi American Corner.

PMAG has been awarded The ECEI BRONZE Label "Striving for Cluster Excellence" through the partnership within-cluster excellence. The award confirms that the organization fulfils the Eligibility Criteria for Cluster Management Excellence Labels and documents its intention to strive for excellence by improving management capabilities and performance levels. The ECEI BRONZE Label "Striving for Cluster Excellence" documents the intention of a cluster management organization to strive for excellence by improving its management capabilities and performance levels. As of now, PMAG is the only cluster from Georgia that has the ECEI Bronze Label. This is in line with the strategy's targets of strengthening the overall competitive position of domestic packaging companies and securing compliance with environmental protection standards.

Partnership for educational projects for students: PMAG Cluster and Kutaisi American Corner have signed a memorandum of cooperation, which will allow the parties to actively cooperate in the common interest on projects within the field.

The cooperation agreement was developed with the Lithuanian Food Exporters Association (LitMEA), which aims to facilitate, develop, and build durable collaboration between the Parties in international cooperation between Europe and Georgia and other Eastern Partnership countries. The agreement facilitates developing partnership mechanisms between business, science, clusters, regions, countries and continents; Stimulates international cooperation, especially in the field of international commerce, investment and export promotion, to unlock business, cooperation and new projects opportunities; Supports companies, especially SMEs, in the identification of growth opportunities to access to global value chains in emerging industries. Intersectoral interactions creation of an optimal environment for economic, social and technological development is also covered within this partnership.

Signing several MoUs had a significant and tangible impact within 2021, responding to boosting the inter-firm collaborative initiatives/projects undertaken between the CMOs' members and solving the priority need of cluster member companies: PMAG Cluster in cooperation with the Kutaisi American Corner, is implementing an educational project in the Imereti region - "Social Media Management". 6 students have been given the opportunity to apply their skills in the real world through an internship program in member companies in the Imereti region. Within the

framework of the memorandum of cooperation between PMAG and the international auditing company "Kudos Georgia", all cluster members will be given a voucher of 2,500 GEL. As for the framework MoU between the Georgian Waste Management Association (GWMA) and PMAG, training on “Occupational Safety Requirements in Production” was organized. The program provided professional practical advice to companies involved by occupational safety experts.

To evaluate **packaging sector development trends**¹⁶ for 2021, the project surveyed packaging cluster member companies and collect statistical data relating to the packaging sector. In the scope of the project, 62 packaging cluster member organizations were surveyed, and packaging product import and export statistics for 2021 were collected and analyzed.

Referencing the outcome indicator of the growth rate of selected clusters’ members’ turnover achieving a 20% level for 2022, the indicator is overfulfilled. The average turnover for cluster member companies for 2021 increased by 53.8% compared to 2018. This increase occurred even though sales in 2020 decreased over the year due to the pandemic but recovered fast in 2021. The project target was 20% growth, so even in the face of Covid-19, sales are above target. Over the year 2021, the number of cluster members increased from 37 to 92, so the turnover for this reporting period was tracked for more companies than for the previous one.

Packaging producer companies (full members of PMAG) appear to be more resilient to pandemic realities than other downstream businesses in the packaging cluster. Turnover growth from 2018 to 2021 for packaging companies is 73.8% compared to 53.8% growth for all members together.

PMAG has a multi-tier membership structure, keeping the flexibility to attract more members from the packaging value chain. Based on this structure, as of 2021, out of **92 members (compared to 33 members in 2020)**, **27 companies are full members** (packaging producers), **55 are associated members (downstream, upstream and supporting sectors)**, and **10 are honorary members** from different parts of the packaging value chain. PMAG introduced free honorary membership for educational organizations and other supportive non-profit institutions to strengthen linkages between these organizations and cluster members. **Women manage 20% of member companies or are co-managed by women at a cluster member companies' level.**

Within 2021, PMAG cooperated with other JP programs and participated in IOM and FAO organized events. PMAG also participated in WPO organized events and engaged packaging sector companies in them: IOM diaspora economic and business forums, FAO cluster cooperation, World Packaging Organization Sustainability & Save Food Working Groups.

UNDP promoted knowledge sharing and capacity building within the packaging sector and the development of packaging guidebooks. This resulted in enhancing entrepreneurship and business sophistication as well as the development and functioning of the clustering approach. The Partnership of WPO and PMAG, with the support of UNDP Georgia, in 2021 was also exceptional.

¹⁶ Annex 19: UNDP Packaging Sector Study 2021

WPO, UNDP and PMAG developed the capability of member organizations. PMAG published/translated the WPO guidebook in Georgian within this partnership about Packaging Design for Recycling¹⁷.

As a full member of the WPO and the only Georgian packaging cluster, in October 2021, PMAG initiated a 4-day training program allowing the trainees and member companies to expand basic knowledge of packaging technology in general, circular economy, environmental sustainability and current updates and issues in the sector, as well as quickly transform this knowledge into their daily activities. UNDP developed a guidebook that envelopes the key topics discussed within the PMAG initiated training by the WPO representatives and key speakers - Professor Pierre Pienaar, the president of WPO and Mr. Kishan Singh, WPO Global Ambassador.

b. Seed/Seedlings Sector (FAO):

Besides supporting the state bodies¹⁸ (MEPA, SRCA, NFA, LMA) with training its specialists to develop capacity vis-à-vis enforcement mechanisms, inspections, reporting and issuance of CAC (*Conformitas Agraria Communitatis*) certificates/plant passports in adherence to standard operating procedures, FAO has also laid the groundwork for the establishment of organized support mechanisms for the private sector as well.

For this purpose, an Association was created with an aim to achieve the coverage of the critical mass of sapling and seed producers, ensuring the widest possible reach for FAO interventions. The association, created on 4 January 2021, is called the Georgian Seed and Sapling Association (GEOSSA) and has been recognized as the CMO for the seed and sapling cluster. As of now, GEOSSA has 21 confirmed members. 21 members span different regions, such as Kareli, Gori, Marneuli, Mukhrani, Mtskheta, Senaki, Zugdidi, Sagarejo, Gurjaani, Tskaltubo, Rokhi and Tbilisi. The member nurseries produce saplings of almond, walnut, hazelnut, berry crops, apple, grape, subtropical fruits and others. The largest seed producers are also members of GEOSSA.

With FAO support mechanisms and GEOSSA involvement, three member nurseries have already complied with the CAC standard and two have earned CAC certificates, issued by SRCA two years in advance before the qualification becomes mandatory in 2024. Compliance to the international standard has become possible as a result of the technical support provided to nurseries, in terms of technical assistance and training, as well as equipment and infrastructural support. Additionally, FAO interventions have made it possible to enrich the perennial fruit cluster with quality infrastructure and facilities, providing access to certified vegetative/propagating materials and pre-stock and stock planting materials, crucial for the production of quality plants/saplings for the farming sector¹⁹. The assistance, coaching and supervision were carried out

¹⁷ Annex 20: UNDP WPO Packaging Design for Recycling in Georgian

¹⁸ Annex 2: FAO Detailed Actions Performance 2021 - The establishment of the qualification and certification systems

¹⁹ Annex 2: FAO Detailed Actions Performance 2021 - Support with the establishment of pre-stock or stock planting material facilities

for nurseries both collectively and on an individual basis. The main directions in which the nurseries have been assisted so far are as follows:

- Awareness-raising activities on the requirements of the CAC;
- Access to basic-level plant materials;
- Provision of technical trainings and technology transfer;
- Needs assessments and individual consultations.

Besides the support with CAC qualification and quality standards, GEOSSA acts as a sector coordinator to support perennial fruit cluster members by implementing Good Agricultural Practices. In that regard, FAO used the support of GEOSSA to organize numerous training sessions, delivered by national and international experts for the benefit of the perennial fruit cluster stakeholders. Training support was divided into two parts: pruning festivals and trainings on Good Agricultural Practices.

CMOs as Sector Coordinator: Pruning Festivals.

The pruning festivals were conducted between February and March 2021 in different villages of Kakheti and Shida Kartli regions and were organized²⁰ by FAO and in collaboration with GEOSSA, the Rural Development Agency (RDA) of the Ministry of Environmental Protection and Agriculture (MEPA), Georgian Farmers' Association, Hazelnut Producers' Association and Almond and Walnut Producers' Association of Georgia. The beneficiaries of the training sessions were hazelnut, walnut, apple, peach and grapevine farmers and producers throughout Georgia. Around 500 beneficiaries were trained. Georgian farmers and agronomists have often fallen short of delivering desirable yields sustainably, so the pruning festivals allowed them to develop skills necessary to maximize plant success rate, while minimizing losses.

The masterclasses were composed of theoretical training, followed by practical demonstrations in orchards and vineyards. Due to COVID-related restrictions, the number of attendees had to be limited, which made it necessary to divide the training up into multiple sessions, making each session shorter.

CMOs as Sector Coordinators: Trainings.

Training on Good Agricultural Practices are crucial for owners of fruit orchards in Georgia, since awareness on modern farm and Integrated Pest Management (IPM) practices are lacking. The trainings were designed to address concrete weaknesses identified as the most prevalent and troubling for producers, especially in the direction of IPM, combating pests, fungal and other diseases. Such activities complement the support that FAO gives to the perennial fruit value chains, all the way from private nurseries to farmers and producers. Clusters were selected based on the

²⁰ Annex 2: FAO Detailed Actions Performance 2021 - Overview of pruning festivals conducted between February and March of 2021

income potential of orchards and the level of interest among farmers themselves. Final decision was made on walnut, almond²¹ and grape wine²² clusters.

The trainings took place in November 2021 for the three crops of major commercial value for Georgian producers. The main beneficiaries of the trainings were owners/general managers of orchards, agronomists and FAO extension specialists. In total, 40 beneficiaries were trained.

The trainings allowed producers to approach farm management in a more organized way and to plan plant protection activities in adherence to instructed agri-calendars. Modern methods of combating the most prevalent pests were presented. Such an approach ultimately allows them to produce greater quantities of much safer and high-quality produce. For example, the most troubling pest, which bothered vineyard owners is *Lobesia Botrana* – also known as the European grape worm. The trainer presented all of the possible methods to control the pest, with a special focus on the biological approach, which uses mating disruption pheromones.

Furthermore, it was decided that the trainer should help medium/large wineries with designing a Mating Disruption Programme for the control and prevention of *Lobesia Botrana* in the selected locations. FAO also aims to work on the creation of Protected Designation of Origin (PDO) and/or Protected Geographical Indication (PGI) for Tsinandali Red wine in Alazani Valley area to support the wine cluster in that area.

4. Packaging and seeds/seedlings clusters enhanced through strategic investment (UNDP):

UNDP conducted an investment needs assessment, which studied the packaging sector value chain's investment needs and identified constraints and opportunities to enhance inter-firm linkages that will unleash the sector's potential. Based on the survey results, the top three areas to be focused on for investment needs are **machinery modernization and upgrading, quality certificates and compliance with international standards, and capacity building and trainings.**

The study revealed that most companies expect stable growth, however, in general, companies are struggling to forecast and plan sales for a longer term. Companies involved in the assessment are strategically focused on:

- Introducing new or significantly improved products;
- Increasing profitability by increasing productivity and efficiency of processes in the organization;

²¹ Annex 2: FAO Detailed Actions Performance 2021 - Walnut and almonds.

²² Annex 2: FAO Detailed Actions Performance 2021 - Grape vines.

- Increasing profitability by introducing new products with higher added value;
- Introducing new or significantly improved production processes; and
- Introducing new or significantly improved product-related technologies.

According to study results, in 2021 UNDP developed and commenced implementation of a Matching Grant Scheme to Support Strategic Investment for Growth. The Grant Scheme supports strategic investments in companies that are deemed necessary to facilitate improvements in the cluster. The Grants Scheme was available for enterprises capable of allocating co-funding. The geographic scope of the Grant Scheme is the Imereti and the Kakheti regions, including Tbilisi, and nationwide coverage given the impact on the target regions.

The project has developed **Criteria for Support Measure in Packaging Sector Companies for Implementing Matching Grant Schemes and the Scoring Card to the Evaluation Board of the Call for Proposals.**

Grant co-financing per beneficiary will be no less than USD 5,000 (equivalent in GEL) and no more than USD 50,000 (equivalent in GEL), which does not exceed 70% of the total eligible project costs submitted by the beneficiary. UNDP anticipates that certain grants (especially larger grants) will be accompanied by corresponding training and the conclusion of maintenance contracts.

UNDP Grant Scheme supports the areas and topics, which support shifting to a better and desirable reality:

1. Investment projects. Areas of intervention include:

- a. Environmental upgrades, particularly related to extended producer responsibility.
- b. Specific production innovations for early adopters.
- c. Design innovations for improving added value; and
- d. Adjustment to the production process to facilitate certification.

2. Service projects. Areas of intervention include:

- a. Environmental upgrades, particularly related to extended producer responsibility.
- b. Services related to product and technology innovation (e.g., advisory services, training, legal services, procedures to secure intellectual property rights); and
- c. Financing certification processes.

The Call for identifying suitable NGO to implement the grant scheme was agreed to be announced in 3 lots: for Tbilisi, Imereti and Kakheti. UNDP has selected high-quality competent partners separately for the regions.

The evaluation board evaluates each lot separately. The Board has the decisions for Kakheti Region²³ already and for the Tbilisi and Imereti lots as well as remaining Kakheti lots evaluation

²³Annex 21: UNDP Strategic Investments for Growth for Companies in The Packaging Supply Chain Report for Kakheti Lot

board decisions will be available during 2022, in parallel grant implementation will be continued for all the mentioned lots.

5. Progress on output indicators

UNIDO: At the Output level, UNIDO aims at strengthening the capacities of policymakers and other stakeholders to identify and develop clusters.

The Target 1.1 Cluster mapping undertaken based on prioritization criteria set with local counterparts (baseline – 0, target by 2022 – 1) was successfully achieved at 100% in 2019 and formally validated in 2020 as in the reporting period of 2019 UNIDO conducted first-of-its-kind comprehensive mapping of 57 emerging and potential clusters in Georgia.

The Target 1.2 No of emerging and/or potential clusters detailed diagnostic studies by the programme (target by 2022 - 8) was achieved at 100% as UNIDO conducted all initially agreed eight cluster diagnostic studies (three in 2020 and five in 2021). The cluster diagnostic studies conducted in 2020 include 1) Pharmaceutical production with a focus on bacteriophage and herbal medicine (Tbilisi), 2) Processing and preserving of fruits and vegetables with a focus on hazelnuts (Samegrelo-Zemo Svaneti), and 3) Marine fishing (Samegrelo-Zemo Svaneti). In the reporting period of 2021, UNIDO has finalized other five initially agreed cluster diagnostic studies: 4) Toys production (Tbilisi), 5) Jewellery (Tbilisi), 6) Fruit and vegetable processing cluster with a focus on hazelnuts (Guria), 7) Poultry (Kvemo Kartli) and 8) Wine (Kakheti).

In addition, the Ministry of Environmental Protection and Agriculture (MEPA) has selected an agglomeration of greenhouse enterprises and supporting institutions in the Imereti region to support strategic investments and promote a cluster approach. To support this endeavour, upon the request from MEPA, UNIDO agreed to conduct an additional cluster diagnostic study for the greenhouses.

Out of 57, all clusters (except for the greenhouse cluster of the Imereti region) were selected for an in-depth diagnostic study based on the following four criteria: 1) Highest growth potential (from top 20 clusters), 2) Priority clusters for the government, 3) No prior diagnostic studies conducted for the cluster, and 4) No major technical assistance provided by development partners to support the cluster development.

The studies aimed to review the business operations of the companies, fix linkages between cluster members and stakeholders, identify challenges hampering cluster development, develop the vision of the cluster, and identify short, medium and long-term objectives. The cluster diagnostic studies defined the clusters, provided an overview of its history and presented the clusters' location map. It reviewed the production process, analysed business operations, presented vital statistics, and looked at the nature of cooperation in the clusters. The SWOT analysis of the clusters was presented, and short-run objectives were defined.

The cluster diagnostic studies were prepared by UNIDO Cluster Team with major analytical inputs from subcontractors: TBSC Consulting and PMC Research Centre, in the period of the first two quarters of 2021. Subcontractors were selected through competitive bids.

The cluster diagnostic studies were conducted according to UNIDO methodology and the following milestones were achieved in 2021:

1. Series of focus groups discussions were organized as part of the six cluster diagnostic studies (Activity 1.2.3 Local focus groups and SWOT analysis, by December 2021 – 100%)
2. Instead of organizing separate validation workshops at the local and national levels, due to COVID-19 restrictions, UNIDO opted for two validation workshops in order to present the results of all eight cluster diagnostic studies (Activity 1.2.4 Validation workshops at the local level, by December 2021 – 100%, Activity 1.2.5 National seminar to present the results of the mapping and the diagnostics, by December 2021 – 100%). The first validation workshop (virtual) to present three cluster diagnostic studies took place on 29 September 2020. The second Clusters' Diagnostic Studies Validation Workshop (virtual) took place on 29 March 2021 with the representatives of governmental institutions, UN organizations and the private sector gathering in Tbilisi to discuss the results of the diagnostic studies of five clusters. The participants of the workshop validated the studies and pointed out the importance of cluster development.

UNIDO has also presented an additional cluster diagnostic study for the Greenhouses at the virtual meeting with donors and international organizations organized by MEPA and Imereti Agrozone (IAZ) on 20 September 2021.

The Target 1.3 No of institutions and people trained on cluster mapping and diagnostic (% of women) (target by 2022 - 5 institutions, 30 people) was fully achieved at 100% by February 2020, since UNIDO conducted a capacity building training on the cluster development approach with a focus on diagnostics and action planning for sustainability on 12-13 February 2020.

The Target 1.4 N of cluster activities realized in pilot clusters identified through the diagnostic (target by 2022 – 2) was achieved at 10% by December 2021 since UNIDO dedicated 2021 for building trust between cluster stakeholders, agreeing on the concrete cluster level interventions and building the foundation for the formal establishment of the clusters and the implementation of the collective activities.

The process of selection and realization of the collective activities in the selected clusters: Georgian Pharmaceutical Cluster and the Georgian Marine Fishing Cluster, was done based on the regular communication and feedback from the cluster members and the following milestones were achieved in 2021:

1. UNIDO organized a series of meeting both physical and virtual to agree on the concrete collective activities and the legal aspects of the cluster establishment (Activity 1.5.1: Identification of collective activities that clusters can put in place and work plan validation

with the identified cluster stakeholders, by December 2021 – 50%). The Cluster Development Strategy and the Workplan will be finalized in the second quarter of 2022

2. The agreement was reached among cluster members to develop a separate corporate identity, logo and websites. UNIDO has selected the company “Idea Design Group” through open competitive bidding (Activity 1.5.2: Establish and strengthen the capacities of the Cluster Management Organizations to improve their service delivery and increase inter-firm cooperation (joint website, joint advocacy and lobbying, common training facilities, etc.), by December 2021 – 10%)
3. UNIDO and the clusters have not yet initiated any particular major initiatives to promote a public-private dialogue, however, Government institutions such as Enterprise Georgia, Poti Branch of Batumi State Maritime Academy, Maritime Transport Agency of Georgia and the Regulation Agency for Medical and Pharmaceutical Activities were also sensitized about cluster development and planned activities (Activity 1.5.3: Facilitate public-private dialogue towards sector-specific policies, strategies and support programmes, by December 2021 – 10%)
4. The need to support the companies with the introduction of the GMP standards as well as raise awareness about the importance of the E-commerce and E-marketing was clearly outlined in the Cluster Diagnostic Studies. This was further reiterated and confirmed by the cluster members. UNIDO has initiated the recruitment process of the National GMP and E-marketing Experts in 2021 (Activity 1.5.4: Training /coaching of MSMEs and Experts in Global Manufacturing Practice (GMP), fish landing technologies, marketing, e-commerce, etc., by December 2021 – 10%)
5. No particular activities were conducted in 2021 concerning attracting foreign and local investors (Activity 1.5.5: Organize B2B meetings, international conferences, forums and other events to attract foreign and local investors, by December 2021 – 0%). The project expects to initiate these activities once the clusters are formally established at the beginning of 2022.
6. UNIDO has organized a series of meeting with cluster members to agree on the market studies. The majority of the Georgian Pharmaceutical Cluster members see a limited opportunity in exporting to the EU due to the very strict GMP standards in the EU. Thus, an agreement was reached to focus initial market studies on Vietnam and Kazakhstan. UNIDO has announced the Request for Quotations and is in the process of identification of the companies to commission the market studies (Activity 1.5.6: Conduct market and feasibility studies, by December 2021 – 10%)

FAO: At the Output 2 Level, FAO aims at developing and functioning of the clustering approach in the seeds/seedling sectors.

Indicator 2.1 *Number of CMOs that are operating in the packaging sector, target for 2022 is 2 (for FAO and UNDP). Achieved 1 in seeds and saplings sector.*

Through 2021 FAO worked intensively with potential members of the seed and saplings cluster to assess their needs, requirements and to decide on the main roles and objectives of the CMO (Cluster Management Organization). Based on the findings, FAO proceeded with a vision building and action planning exercise to draft a preliminary work plan for execution of cluster activities in practice. Thorough research and direct engagement with cluster stakeholders showed that creation of the first association in the seeds and perennial fruit saplings sectors would be highly welcomed by the value chain members. Therefore, it was decided to create such association and to recognize it as the CMO. A Secretary General was hired and appointed as the cluster manager, directly responsible for the day-to-day management of the CMO. Together with the Secretary General, a statutes document was drafted, right along with a Code of Ethics document and a Membership Application Forms for potential members. The statutes document was presented to the Public Service Hall of the Ministry of Justice for official registration.

The CMO is named Georgian Seeds and Saplings Association (GEOSSA)²⁴ and was registered on 4 January 2021 as a Non-commercial legal entity. The first General Assembly held physically convened on 15 May 2021 and was attended by representatives of ten nurseries, as well as invited guest speakers representing cluster stakeholders. The following actions were taken on that day:

- Approval of membership of new applicants
- Decision on a membership fee
- Approval of the Association logo
- Review of the development strategy

Since then, significant milestones have been delivered on by GEOSSA, namely:

- More nurseries were brought to join the Association, ensuring wide coverage of value chains.
- The largest certified seed producers became members of GEOSSA.
- GEOSSA became a member of International Seed Federation (ISF) in July 2021. The Association took the status of an Observer Ordinary Member and was exempted from membership fees for the following two years.
- The Secretary General and staff of GEOSSA have been supported and trained to provide support on standards and certification in August of 2021.
- GEOSSA signed a memorandum with the SRCA for clonal selection of local grape vine varieties with an aim to produce a nuclear stock of improved and virus free planting materials, earning the pre-basic/basic category status under CAC. As of currently, the Scientific Research Centre of Agriculture (SRCA), as a state body, is not legally allowed to either sell the planting materials, or to hand it over to the private sector for free. Therefore, the Georgian Government has to think of a scheme, whereby it will be possible to distribute healthy, virus-free and CAC-compliant rootstocks and scions to the private sector.

²⁴ Annex 2: FAO Detailed Actions Performance 2021 - Vision and objectives of GEOSSA.

Indicator 2.2 *No of companies who are part of the CMO in the seeds and seedlings sector. The target for 2022 is at least 50 companies in both clusters. By the end of 2021, GEOSSA had 21 confirmed members.*

After final registration of the Association, the CMO moved forward with the recruitment and invitation of the seeds and sapling producer enterprises that have the best capacity to meet international standards and to make the most of project interventions. Many enterprises were contacted directly by the CMO, some with the support of FAO and some with the support of different representatives of state bodies. It was important for the CMO to engage in a deliberate process of trust and relationship building exercise with the potential members and to explain the real, tangible benefits that they can receive from membership. Once the targeted potential members understood the concept of clusters and the collective benefit that was expected as a result of project interventions they became happy to join.

As of currently, GEOSSA already has 21 members and the membership is growing. Each member fills in an application form, familiarizes itself with the Statutes of the organization, its values and core objectives and signs the Code of Ethics form. Afterward, the board of directors of GEOSSA make a decision on the ascension of an applicant into membership.

The members represent perennial fruit nurseries and seed producers from different sectors, such as almond, walnut, hazelnut, berry crops, apple, grape, subtropical fruits and others. The largest seed producers are also members of GEOSSA. The 21 member nurseries span across different regions, such as Kareli, Gori, Marneuli, Mukhrani, Mtskheta, Senaki, Zugdidi, Sagarejo, Gurjaani, Tskaltubo, Rokhi and Tbilisi.

Indicator 2.3 *No. of inter-firm collaborative initiatives/projects undertaken between the CMOs' members. The target for 2022 is at least 10 for both clusters. 10 cluster activities successfully carried out in the seeds and saplings cluster alone.*

After creating the CMO, FAO proceeded with drafting of a cluster development strategy in April-May of 2021, as a follow-up to a vision building and action planning exercise. The development strategy, together with a work plan, was built based on the findings from a research, telephone interviews and direct engagement with cluster stakeholders, not only along the core value chains, but within support institutions too (such as farmer associations, laboratories and others) which was conducted around the same period in 2021.

Inter-firm collaborative initiatives/projects were planned and undertaken between the members of the cluster in the following directions in 2021:

- In an attempt to facilitate access to improved varieties for berry nurseries and berry farmers, new blueberry varieties are being trialed in Georgia on a land plot of a GEOSSA member.

The access to the new blueberry varieties was made possible by an a UK-based company „Plants365“, which trials different blueberry varieties for eventual commercialization. This helps the CMO to achieve its aim of supporting the adoption of new, licensed varieties in Georgia.

- An online workshop was undertaken on seed trade, regulations and access to foreign markets delivered by ISF (International Seed Federation) representatives for Georgian seed producers on 26 August 2021. The attendees were introduced to such crucial matters as:
 - ✓ Seed trade, international standards and the control of seed movement in international trade;
 - ✓ Varietal certification systems following OECD seed schemes;
 - ✓ Update on phytosanitary regulations;
 - ✓ Intellectual property regulations and the International Union for the Protection of new Varieties of Plants (UPOV) – of which Georgia is a member state.
- GEOSSA participated in a meeting between RDA and nurseries/sapling importers on the initiation of the new program that will cover the cost of the saplings for 200,000 beneficiaries nationwide that own an agricultural land plot of up to 0.5 ha. The program considers covering costs related to six fruit cultures with the maximum amount of 500 GEL per beneficiary. GEOSSA requested the involvement in the planning and execution through the Rural Development Agency (RDA) and Scientific Research Centre of Agriculture (SRCA) of the Ministry of Environmental Protection and Agriculture (MEPA) and submitted relevant official letters of request.
- A memorandum of the partnership was signed in May 2021 between GEOSSA and Georgian Farmers Association (GFA) to ensure wider coverage of the farming sector in pursuit of promotion of certified saplings. Furthermore, GFA representatives trained the GEOSSA members on the process of GeoGap certification, its procedural implications and its benefits.
- GEOSSA signed a memorandum on partnership with a college “Phazisi” in Samegrelo in December 2021, which will allocate a plot of land for testing and adaptation trials designated for different fruit sapling varieties.
- FAO supported GEOSSA with facilitating discussions with the Insurance Association of Georgia on developing a possible insurance package for nurseries. A survey was conducted amongst the members of GEOSSA to discover the main needs, risks and also to make estimations on the size of the total market to allow the Insurance Association to determine the level of insurance premium. In October 2021, the insurance companies were able to make approximate estimations about the size of the market, insurable risks and calculated the insurance premium.
- In March 2021, GEOSSA Chair of the Board of Directors invited berry nursery owners to his facilities for a showcase of quality and nursery management practices. A member berry producer was also invited from Woman Farmers’ Association. The exchange allowed them to connect with each other, share their experiences, raise awareness on good agricultural practices and see the nursery infrastructure on sight.

- A roundtable was organized between FAO, Georgian Gene Banks, GEOSSA and SRCA in November 2021. The Georgian gene banks were represented by the Academy of Agricultural Sciences of Georgia, the Agrarian University Gene Bank, Biological Farming Association Elkana and the Botanical Garden. During the meeting some existing challenges were identified and possible next steps were planned. At the follow-up meeting, held in December 2021, the parties created a working group led by the SRCA, agreed on a draft Action plan and assigned responsibilities to each member. Gene Bank representatives were trained on the application form to be included in the EURISCO database and the SRCA provided support to each one of them to successfully fill in the forms to provide updated information on the genetic resources available at the disposal of these gene banks.
- In May 2021, GEOSSA and FAO collaborated with the packaging cluster (PMAG) to develop offers and packaging solutions for the nursery cluster. A survey was conducted among member nurseries to assess their needs, after which PMAG delivered a presentation on the offers that the packaging cluster members can make to sapling and seed producers. Furthermore, packaging companies were put in contact with representatives of the SRCA to procure such packaging/labeling materials as stand-up, side-gusseted aluminum pouches and printer paper for labelling through PMAG.
- FAO signed a contract with Export Development Association (EDA) to conduct research on export possibilities and opportunities for Georgian sapling producers to European countries. The study helped understand the principle needs and trends on the European markets regarding sapling trade, as well as certificatory and quality requirements that need to be met to enter such markets.
- Promotional²⁵ activities were carried out to cover cluster activities and to raise awareness about the need for certified plants and for the qualification/certification schemes.

Indicator 2.6 *No. of priority needs solved in CMOs.*

The target for 2022 is 20 (in total for the packaging and seeds and seedlings sector). Result for 2021 is that 7 priority needs solved for the seeds and saplings CMO, including technical assistance, trainings on critical needs and procurement of production material and equipment.

The Secretary General of the Association has been engaging directly with member sapling producers throughout 2021 to explore their needs, and challenges and decide on the main course for interventions. The priority needs were listed as a result of the needs assessments done individually with members. As a result of the exercise, priority needs for the seeds and saplings cluster were identified in two main directions:

- 1) Support with improving linkages along with the core and extended value chains, development of business services and match-making;
- 2) Facilitation of collaboration between stakeholders, organization of discussions on modern agricultural practices, innovation and networking.

²⁵ Annex 2: FAO Detailed Actions Performance 2021 - Promotion of cluster activities and certified plants.

GEOSSA has provided technical support to its member nurseries in pursuit of achieving CAC compliance. None of the members of the cluster had been compliant to the CAC before the project commencement. GEOSSA has supported member nurseries with overcoming challenges vis-à-vis the upcoming qualification/certification systems. In that respect, GEOSSA has concluded a study of the facilities, infrastructure, premises and nursery management systems of its members. Provision of relevant support was agreed upon to overcome the barriers acting as a brake towards complying to CAC. Consequently, 10 member nurseries will be getting support in acquiring planting materials needed for the establishment of mother-blocks, as well as tools and equipment to improve the production process and to adapt to the requirements as laid out in the qualification system. In addition, collective trainings²⁶ were delivered for GEOSSA members in March and December 2021.

- Training on berry propagation techniques;
- Training on proper storage and planting of saplings.
- Plant protection to present procedures developed for CAC related diseases;
- Plant Breeders' Rights and National Register of Varieties;
- Intellectual property issues amongst nurseries;
- Micropropagation

Additional areas, where priority needs have been addressed are as follows:

- The most popular university in the field of agrarian studies - Agrarian University – became a member of GEOSSA and is in the process of establishing a grape vine nursery. GEOSSA was asked to visit its premises and to assess its compatibility with the qualification standards and to provide recommendations to create a grape vine nursery with modern infrastructure, including a mother-block for basic planting materials in line with international standards.
- Member nurseries have been supplied with grafting equipment, production equipment, materials and basic-level healthy propagating plants. The state nursery of the Adjarian government – N(N)JP Agroservice Center – was supported with the establishment of a new mother-block screen house for citrus vegetative materials. Access to healthy, virus free, basic-level and productive vegetative materials has been the key element that was missing in the perennial fruit sapling cluster.
- One of the factors undermining the sustainable development of the cluster is related to intellectual property rights. On 25 August 2021, a roundtable session was organized via Zoom with the participation of GEOSSA, MEPA, SRCA, Sakpatenti and international consultants. One of the main topics of discussion was to present concerns and challenges related to the registration of new plant varieties. As a result, the parties proposed amendments to the existing Georgian legislation on the New Varieties of Animals and Plants, which allow for the execution of DUS (Distinctness, Uniformity and Stability) tests. The document presenting amendments was handed over to Sakpatenti.
- Skill and knowledge deficiency is affecting the perennial fruit sector negatively, pulling its overall productivity down. In order to address such knowledge deficiencies, pruning

²⁶ Annex 2: FAO Detailed Actions Performance 2021 - Trainings for nurseries.

festivals/trainings were organized, and delivered by local and international experts. Farmer associations from the support institutions were involved in the process of inviting beneficiaries. The pruning festivals benefitted producers of hazelnut, walnut, peach, apple and grapevine producers. Around 500 beneficiaries were trained over the course of several days.

- In addition to developing pruning skills, trainings were organized on Good Agricultural Practices. In total, 40 beneficiaries were selected from walnut, almond and grape wine clusters to participate in the trainings.

Indicator 2.7 Seedling Certification System approved and operational.

Seedling certification system designed and approved by the Georgian government in 2021 and to enter in force in 2024.

FAO supported the Government of Georgia²⁷ with establishing a regulatory framework aimed at transforming the perennial fruit sapling cluster from producers of low-grade, sub-standard plant materials, with infrastructure and managements systems incompatible with international standards to at least CAC (*Conformitas Agraria Communitatis*) compliant ones. Georgia currently has a series of legal instruments in place, regulating the production and commercialization of plant varieties and related materials²⁸.

In addition, the project supported with the definition and approval of Decree №478 on “qualification requirements for nurseries that produce fruit propagating materials and saplings²⁹” issued on 28 September 2021. The decree was prepared after the certification system was designed, together with the establishment of SOPs (Standard Operating Procedures) for control and inspection mechanisms and issuance of certificates with the help of FAO. Representatives of MEPA, SRCA, NFA and SLA specialists were supported and trained by FAO experts and other stakeholders to help develop their capacity to carry out respective duties effectively.

Indicator 2.8 Seed Association created.

The target for 2022 was to create one seed association.

FAO representatives and the Secretary General of GEOSSA met directly with the heads of certified seed producer companies to offer them membership in the Association, which made it possible to add seeds sub-union to the association. Therefore, the seed association was created as part of GEOSSA on 4 January 2021, registered as a Non-commercial legal entity under the Georgian legislation. As part of GEOSSA, the seed association represents the seed cluster in Georgia and its members participate in the general assemblies. In addition, GEOSSA is the first and the only organization from Georgia to have become a member of International Seed Federation (ISF). Membership of ISF will open up networking and knowledge-sharing opportunities for seed producers on an international level.

²⁷ Annex 2: FAO Detailed Actions Performance 2021 - Support to the implementation of the certification system.

²⁸ Annex 2: FAO Detailed Actions Performance 2021 - Decrees on plant materials.

²⁹ Access to the decree: [Decree N:478, Government of Georgia](#)

Indicator 2.9 *Number of nursery operators registered and selling certified nursery material. Planned Target: 25 (at least 10% women –led). Achieved 2 in the seeds and saplings cluster.*

Through intensive support mechanisms provided by FAO and GEOSSA, such as trainings, individual coaching and supervision, as well as support with infrastructure and planting materials, two members of the cluster have already earned the CAC certificate in advance. As per the Decree №478, CAC qualification will become mandatory from 2024, but cluster members are being supported actively to ensure compliance before that date.

Opening of the Jighaura facilities, with two screen houses, covering an area of 800 m² in total (400 m² each), has also contributed greatly towards the establishment of the international standard of CAC³⁰. The screen houses allow for a full isolation of the live collection from possible spread of viruses through carrier insects, making it possible to safely preserve, store and distribute vegetative material in the country. Supply of quality, virus-free, certified vegetative material, together with necessary documentation and paper-work, is an important building-block for knowledge to develop in the country vis-à-vis the production of under CAC standard. The official opening ceremony of the screen houses took place on 2 March 2021.

As a consequence of the project interventions, two member nurseries have become CAC compliant voluntarily, with certificates earned from the SRCA in 2021. One more nursery is on course to earning the certificate in the foreseeable future. The member nurseries hold official documents, certifying that they produce CAC grade saplings approved by the SRCA as the issuing authority.

Indicator 2.10 *The creation of multi-stakeholder platform for seeds and seedlings. The target for 2022 was one multi-stakeholder platform. One multi-stakeholder platform has been created for the seed and saplings cluster.*

Having conducted meetings and deliberation with cluster members it was decided that the multi-stakeholder platform would be created in a digital space for frequent communication. The multi-stakeholder platform for GEOSSA members was created on Viber and is actively operational. The digital platform is used by the members of the cluster for frequent communication to discuss different topics and issues based on need. Currently, the members of the platform are the SRCA, the NFA, the RDA, Sakpatenti, the SLA, cluster members and FAO representatives. The platform has been used to discuss matters concerning procurement of planting materials, varieties, exchange of information and sharing of news about updates and recent developments in the sector, as well as on upcoming events, trainings and activities that might be of interest for the stakeholders. In addition, a separate Viber platform is created for member nurseries and seed producers only.

³⁰ Annex 2: FAO Detailed Actions Performance 2021 - Support to the Jighaura Research Facilities.

UNDP: At the Output 2 Level, UNDP aims development and functioning of the clustering approach in the packaging.

Indicator 2.1 Number of CMOs that are operating in the packaging sector, target for 2022 is 2, Achieved, CMO in packaging sector is established with 3 branches (Tbilisi, Kakheti and Imereti).

To achieve this milestone, UNDP continued to undertake the following actions:

1. **Raising Awareness in Clusters:** UNDP continued to present a series of workshops, one-day events and study tours (led by an PMAG representatives and international partners) to raise awareness among packaging company representatives on the benefits and specificity of the cluster.
2. **Cluster management capacity development through international best practices:** UNDP organized series of meetings and series of workshops among packaging cluster management organizations and member companies to discuss development opportunities in the Tbilisi, Kakheti, and Imereti regions. The Packaging Cluster of Georgia reviewed new business models, firm development strategies, certification and management standards, access to finance, energy efficiency technology, and solar energy benefits, among other topics 29 PMAG member companies, 4 CMO members, local governments, the Rural Development Agency, Georgia's Innovation and Technology Agency, and consulting and finance firms participated in the discussion.
3. **Strategy building, implementation and advancements:** UNDP continued to support packaging company representatives build and implement their strategic visions and the operational work plans being undertaken by the cluster initiative. The strategy is built on identified needs and challenges. With support from international experts, recommendations were developed to effectively adapt PMAG Packaging Cluster Strategy implementation to the pandemic and post-pandemic circumstances.
4. **Institutional development of the CMO:** Several internal regulations have been implemented for effective CMO operations. The drafting of regulations was accompanied by capacity-building actions for the CMT in 2021, including planning, services design, communications, visibility and inter-firm cooperation. The cluster continued actively operating its **brand, website, social media sites, YouTube channel and cluster-brand video**. UNDP supported PMAG to arrange PMAG cluster branded materials such as: business cards, badges, shtenders, table stands, table flags, pens and wristbands, notebooks, molberts, tablecloths, face masks.
5. **Capacity development programme:** UNDP assisted PMAG in conducting a needs assessment of producers and consumers, and in initiating a capacity development program with tailor-made solutions for the needs of businesses. In terms of initiatives, trainings, and workshops, the capacity development program addressed the most-requested topics, such as labour safety, sales stimulation, marketing, and communication.
6. **Membership Expansion:** The number of **members** increased to **92 in 2021** up from 33 in 2020 and 8 in 2019. PMAG CMO **staff** also increased to **sixteen employees** at the end of 2021 (compared to seven in 2020). **Local partnerships:** The project cooperated with local and

regional authorities, business associations and educational institutions. During the reporting period, to fill a mismatch of labour supply and member businesses demands, PMAG signed 11 memorandums of cooperation with **leading universities, vocational education institutions and associations in Georgia**: UNDP supported PMAG to establish cooperation and sign 11 memorandums of Understanding.

7. **International partnerships:** The PMAG Packaging Cluster's internationalization was aided by UNDP. UNDP's collaboration with PMAG aided the Cluster Management Organization in expanding and strengthening its capacity and linkages to ASD (Turkish Associate Manufacturers Association), WPO, Lithuanian Food Exporters Association (LitMEA).

***Indicator 2.2** No of companies who are part of the CMO in the packaging sector and the seeds and seedlings sector.*

The target for 2022 is at least 50 companies in both clusters. By the end of 2021, the PMAG Packaging Cluster combined 92 members from the packaging sector (27 full and 55 associate members and ten honorary members).

UNDP has undertaken the following measures since the beginning of the project:

1. **Strengthening and advancing the cluster management and its representation in the Imereti and Kakheti regions:** To effectively implement cluster operations, strategy implementation has commenced, and organizational structure and the core team has been built. Regional representation has strengthened outreach and support efforts for packaging cluster member companies from Imereti and Kakheti.
2. **Expansion of membership:** UNDP supports institutional development of PMAG so that its developmental impact reaches at wider angles both nationally and regionally. Online Member Catalogue: <https://bit.ly/3ukpE5D>

As of 2018, eight member companies had combined total assets of GEL 40 million. 2018 revenue was GEL 35 million and 2019 revenue was GEL 56 million. Employment was 300 people. In 2020, the combined total revenue of the 37 full and associated members surpassed GEL 118 million; total employment reached 1,220 people. **As for, 2021, the combined total revenue of the 92 full and associated members surpassed GEL 237 million; total employment reached 2,500 people.** Women representing both at managerial and operational roles.

Special attention was given to the inclusivity of women in the initiative, delegating cluster development managerial roles to women representatives of the companies. This approach ensured that trust was quickly built among member companies and transformed participants' mindsets towards cooperation.

Members companies represent a differensegmentsnt of packaging sector, like paper, plastic and plastic foil packaging. Project found out that, the revenues (total sales) of the cluster member

companies in 2020 surpassed 118 mln GEL which is up to 22% increase from the 2018 sales figure of the same companies and based on preliminary data, the revenues (total sales) of the cluster member companies in 2021 surpassed 237 mln GEL which is up to 53.8% increase from the 2018 sales figure of the same companies. Generally, cluster members range from manufacturers of all types of packaging manufacturing companies (full membership), companies from upstream and downstream packaging value chains and providers of various supporting services for the industry (associate membership) and honorary members from different parts of the packaging value chain. Current information shows that the position of domestic packaging producers remains rather weak. PMAG Packaging Cluster continues to integrate material suppliers, packaging application industries, logistics and distribution, supporting industries (printers, designers, equipment suppliers) and recycling companies to intensify dialogue and cooperate with these packaging producers. The challenge of remains (though with a positive outlook) to continue the expansion trend and reach the self-sustainability level.

Project undertakes actions to overcome this challenge and to support the packaging industry and individual members to enhance their competitiveness and scale-up through synergies of collaboration across the value chain as well as institutional strengthening PMAG Packaging Cluster. However, it is noteworthy that UNDP-supported actions enabled the CMO to expand membership **beyond 90 members (full, associate membership and honorary) by the end of 2021.**

Indicator 2.3 *No. of inter-firm collaborative initiatives/projects undertaken between the CMOs' members.*

The target for 2022 is at least 10 for both clusters. Five activities were initiated and supported in 2021 in the packaging cluster.

UNDP supported the preparation of the Strategy on Inter-firm Cooperation: Supporting inter-firm cooperation is among the most important — and one of the most difficult — activities that a CMT can organize for its cluster members. The ability to reach good inter-firm cooperation is the main differentiator between regular business support organizations (which often apply a bilateral approach in a client-service supplier relationship) and a CMO.

UNDP Developed Strategy, which includes an action plan for the cluster management team to support inter-firm cooperation. Further, the execution of a short-term strategy has been started and actions that were considered 'low-hanging fruit' for quick wins in CMO development have been initiated. **Identifying cooperation potential for supporting industries:** as revealed by initial studies, the supporting industries (printing houses, design companies, and others) are a crucial part of the proper functioning of the packaging companies. The forward and backward linkages are critical in every industry, including packaging. The packaging industry's impact is channeled through an efficient supply chain in order to add value and meet steadily increasing customer demands. The preliminary study enabled more active involvement of supporting industry representatives in the creation of packaging in Georgia. The full product development cycle with

the involvement of the supporting sector representatives will be drawn, and the needs will be identified within spring 2022 when the study is finalized.

Strengthening a cluster quality brand label is on track: The brand development took off in 2020, the initial steps included the development of a [website www.pmag.ge](http://www.pmag.ge) and **social media site, brand logo, communication package (e.g., posters, photo shootings, brand video, business cards).** **The process prolonged actively in 2021.** UNDP supported with recommendations on inter-cluster linkages and the internationalization of the packaging cluster³¹. The Cluster Management Team foresees establishing a workgroup “PMAG Go Global” focusing on the internationalization activities of the cluster members. PMAG cluster member companies will overcome the pandemic-incited fear of taking risks and besides focusing on surviving and maintaining their positions in the market, will be given the opportunity of the investment support that is necessary to improve their standards and prepare these companies for certification, as a prerequisite for international business development.

Besides the promotion of business-to-business cooperation on international markets, the CMO should consider entering into cooperation with other clusters in the world. For what concerns the latter, the CMO should first define the reason for cooperation with two different groups of clusters, namely:

- similar clusters active in packaging value chains,
- clusters representing companies in the downstream sectors.

The first group of clusters could be addressed with a proposal to cooperate on joint competencies development issues or technology development. The second group of clusters represents potential clients for the PMAG cluster members.

The list of Machine Supplier Providers³² was also incorporated for reinforcing the inter-firm collaborations and supply chains in the packaging industry for the companies that are capital-intensive. The well-functioning, upgraded machinery is vital for these business operations, in order to attain less waste and discrepancies. The machinery is in a strong correlation with the costs of the production and energy usage. Purchase of the new machinery is related to the very high costs and obstacles related to the existence of relevant suppliers. thus, UNDP intervened and incorporated the above-mentioned list of suppliers for such companies and took the intermediary role among the capital-intensive packaging companies and machinery suppliers.

Indicator 2.4 % of self-financing of CMO in packaging

Achieved, subject to cluster member adhere fulfilling payment of member fees - Target for 2022 is at least 30% self-financing (does not include donor funding). Over 30% of self-financing annualized, adjusted for operational costs, 82 paying member companies financing volume in case

³¹ Annex 23: UNDP Recommendations on inter-cluster linkages and the internationalization of the packaging cluster

³² Annex 24: UNDP List of Machine Suppliers

full financing exceeds GEL 100,00 annualized, while annualized operational costs do not exceed GEL 200,000.

UNDP continued to support the PMAG Packaging Cluster through low-value grant agreements, supporting the cluster in operations and in member company integration. The cluster will need a continuation of external support to reduce the gap in financing by the end of 2022 and to be able to provide basic service activities for members.

The cluster has reached 82 paying member companies, thus should generate annual fees over GEL 100,00. Full member companies (packaging manufacturers) pay an average yearly membership fee of GEL 2,400 (divided into three categories: GEL 1,200 for micro-enterprises, GEL 2,400 for small enterprises and GEL 3,600 for medium and large enterprises). Associate member companies (downstream, upstream and supporting industries) pay an average yearly membership fee of GEL 1,200 (also divided into three categories: GEL 600 for micro-enterprises, GEL 1,200 for small enterprises and GEL 1,800 for medium and large enterprises). Due to membership expansion, CMO operational costs should not exceed GEL 200,000. The CMO management team will have to be involved in networking activities to further expand membership and regional coverage. Delivering revenue-generating business support services remains challenging and entails specific in-house competencies. Another challenge remains sustainability and continuation of stable payments from member companies, the financial year 2021, due to pandemics was quite challenging for companies, many companies are lagging behind membership fee payments.

Indicator 2.5 CMO in packaging cluster facilitates extended producer responsibility (EPR) implementation in packaging.

The indicator is on track;

Development of the Extended Producer Responsibility-related legislation is still ongoing in Georgia. The Government has approved Technical Regulations for 4 out of 6 EPR specific waste streams. They are WEEE, waste oils, waste tires, waste batteries and accumulators. The already approved Regulations establish the national targets to be achieved gradually for collection, recycling and recovery of the respective waste. Two more Regulations (for packaging waste and ELVs) are being currently reviewed by the Governmental Institutions and the key stakeholders.

The rules of operation of the EPR Registry for the already approved waste streams have been established by the Order of the Minister of Environmental Protection and Agriculture. A similar order is expected with regard to the packaging waste, as soon as the respective Technical Regulation is approved.

Financing EPR, Advance Recycling Fee: As the Specific EPR legislation for packaging waste has not been approved yet, so the assumptions used for the following description are based on the

latest draft provided by the Ministry of Environmental Protection and Agriculture, which is the author and initiator of the EPR legislation in Georgia.

According to the requirements of the already approved (other EPR streams) as well as to be approved soon packaging EPR legislation, the new schemes will be based on the producers' financial responsibility for all activities related to managing waste, generated from the products they put on the market. Every producer is obliged to pay a monetary contribution to the PRO, a member of which it is. The contribution is called "advance recycling fee" and is being determined by PRO in accordance to the market share of the producer.

Cooperation with Municipalities: The latest draft of the Technical Regulation obliges both, Municipalities and the relevant PROs (that will be established in the nearest future) to cooperate in order to set up a separate collection system and to achieve the collection and recycling targets.

Deposit and Refund Scheme: The draft Technical Regulation introduces an obligatory deposit and refund system (deposit scheme) for certain products. A deposit scheme is defined to be a system, where a product has a specified deposit that is reimbursed to the customer if it returns packaging waste generated from that product for recycling purposes. A deposit is a price margin added to the product subject to the deposit scheme and to be returned to the customer after being deposited into the waste collection system. All producers that place on Georgian market soft drinks, carbonated soft drinks, beer, energy drinks and mineral water are obliged to join the deposit scheme. The scope of the scheme covers the following packaging of the above-mentioned products: plastic and metal. In 2021, PMAG Packaging Cluster continued to prioritize strengthening market positions, applying good business models, promoting environmentally friendly approaches, making technological advancements and entering new markets. PMAG, in collaboration with UNDP, initiated measures reducing the impact on the constituent elements of the environment and scanning environmental performance practices for the member companies in order to reduce the impact on the environment and develop competencies for the cluster member companies' sustainable competitiveness: identification of cost-effective investments in energy efficiency and implement practices to save energy by refining processes, activities, and measures.

UNDP closely follows the legal drafting and hearing processes related to EPR, constantly updating its analysis with developments so that it can quickly react and support companies at the regulation or compliance stage. Since there has not been any progress of adopting regulation, recommendation is valid for the next reporting period.

The following activities were recommended to support Georgian packaging sector businesses comply with upcoming EPR regulations and these recommendations are valid for the time being as well:

- Support producer and importer efforts to establish the legal entity (PRO);

- Develop guidelines for producers/importers on how to prepare documents to establish a PRO;
- Assist in the preparation of files for the authorization of PROs, including assistance in all technical and financial issues, the design of separate collection systems for sorting and recycling, the development of a business model and estimating PRO budgets;
- Develop detailed guidelines on the EPR registry;
- Develop a training module and conduct trainings for PROs covering aspects such as fee calculation, equal treatment contracts for each producer who is a member of the PRO, reporting and contracting with municipalities, retailers, collectors and waste operators;
- Develop a methodology and conduct workshops/trainings on how to achieve targets and how to calculate target achievement;
- Conduct workshops/trainings on implementing the methodology to achieve targets; and
- Hold consultation meetings for supportive dialogue with the private sector in the process of establishing and implementing the EPR system.

As the EPR concept is still new in Georgia, significant awareness-raising efforts are needed in order to increase the understanding of stakeholders and the general public on the needs for and benefits of an EPR system. The increased awareness and understanding will, in turn, promote buy-in and engagement from all relevant stakeholders in the process of the EPR implementation.

Indicator 2.6 No. of priority needs solved in CMOs

The target for 2022 is 20 (in total for packaging and seeds and seedlings sector). Result for 2021 is 14 needs (for packaging cluster).

Based on preliminary studies, 13 actions were undertaken during the reporting period to address needs in four areas:

- I. **CMO development and international best practices**
 1. CMO business strategy and corporate governance
 2. Participation in international exhibitions
 3. Local and international partnerships
 4. Approximation of the packaging sector related to Georgian legislation to EU
- II. **Vocational training and capacity strengthening**
 5. Analysis of training needs and development of vocational training courses for company personnel and people in the labour market
 6. Social media management and sales promotion training
 7. Business model transformation training series
 8. Lean Management training
- III. **Environmental protection and resource efficiency**
 9. Promotion of scanning environmental performance practices;
 10. Packaging technology and circular economy Guidebook;
 11. Packaging designing guidebook;
 12. Energy efficiency audit;

IV. Occupational safety

13. Series of occupational safety regulations, Occupational safety system and management, trainings for the amendments to the labour code of Georgia

14. Occupational safety audit

In 2021, UNDP undertook the actions discussed in the narrative section of the report under the above-mentioned areas.

IOM: At the Output 4 level it is defined, Migration is a mainstream component of SME development support.

Output 4. Migration is a mainstream component of SME development support.

Although there is no direct diaspora related indicator for the Outcome, there is an expectation that diaspora economic forums, engaging diaspora professionals in the clusters' development process, B2B networking, may indirectly influence the Outcome indicators e.g related to turnover and/or export.

***Indicator 4.1:** Diaspora mapping conducted, interests, and priorities for investment identified and presented to the partner agencies for further consideration.*

IOM continued building the diaspora profiles inventory. In total 29 133 data files were filtered and individual profiles of 2 640 diaspora professionals (48% women) were established. The work in this direction is continuing until the very last data file is reviewed and a professional profile developed.

All the persons from the established diaspora inventory, have been outreached in two or more rounds. Currently, 368 diaspora persons, out of the outreached total, expressed their interest in cooperation. The Diaspora inventory is a backbone of all the diaspora related activities envisaged by the project.

122 profiles from the register, have been shared with the CMOs of the Packaging (PMAG), Seeds and Seedlings (GEOSS) and Pharmaceutical clusters, for selection as temporary experts in response to the demand for expertise and experience by the cluster member businesses. An online survey was disseminated to over 100 diaspora persons, to grasp their professional and business interests and accordingly expand the cooperation with them. The results of the survey were analyzed (*Annex 1. Diaspora Survey Report*) and over 20 online individual meetings were held with the respondents.

The results of the survey led to diaspora assignments with FAO and UNDP as well as contributed to finetuning the preparations for the diaspora networking events/diaspora forums.

The diaspora web portal, the sole digital tool for diaspora outreach and communication, integrated into the MFA webspace, was regularly updated for providing information tailored to the needs and interests of the Georgian Diaspora, and other (potential) users of the Portal (www.gda.ge).

Indicator 4.2: *Number of Trained Staff of Central and/or local authorities in mainstreaming migration into local development.*

The awareness-raising meetings at the municipal level on the nexus between migration and development started in February-March 2020, in Kakheti. The intensive work in this direction is planned in 2022.

Indicator 4.3: *Networking events and/or trade fairs in Georgia and EU*

In the reporting period, two diaspora networking events were organized, , on 27 February, and 10-12 December 2022 (online and hybrid format), in close cooperation with the Diaspora Relations Department, MFA and the Administration of the President of Georgia. Around 124 diaspora persons and their professional and business partners attended both events. The forums aimed to encourage diaspora business start-ups, investment and/or their professional assignments in Georgia, particularly in the cluster businesses of the projects' interest. The forums also supported the series of pre-scheduled B2B networking sessions and site visits to food and beverage producers in Kakheti and Shida Kartli regions, from the UNDP-supported packaging cluster. The follow-up actions are planned to carry forward the networking results and turn them into practical cooperation models³³.

(Annex II. *Diaspora Economic Forum_LoP*; Annex III. *Diaspora Economic Forum_Agenda*); Annex IV. *Diaspora networking event agenda* and Annex VI. *List of Diaspora networking event Participants*).

Indicator 4.4: *Number of qualified diaspora assignments for CMOs and/or companies capacity building purposes*

88 diaspora profiles have been shared with the project partner UN agencies – UNDP, FAO and 34 profiles were shared with UNIDO for selecting to assume the diaspora assignment in the identified businesses. 40 profiles were preselected by the UNDP. IOM has initiated 12 online meetings between FAO, UNIDO, UNDP and diaspora persons from different sectors (ICT, trade, finance and logistics). As a result, three diaspora assignments were effectuated with UNDP and FAO partners. The potential assignments are thought for the pharmaceutical cluster businesses as well, in 2022.

Partnership with the partner UN Agencies

³³ Annex 3: IOM Detailed Actions Performance 2021

There was significant engagement on the part of the UN partner agencies in the 1st Diaspora Business Networking Event preparation process. Presentation materials on business support projects (accessibility, eligibility criteria, etc.) were developed and shared with 109 diaspora representatives. Information sharing aimed to support potential diaspora entrepreneurs to acquire the knowledge on opportunities of doing business in Georgia.

Through the organized virtual buyers' mission during the 2nd Diaspora Business Networking Event, PMAG, supported by the UNDP, made extensive outreach to its member businesses, to meet online during the networking event with the foreign businesses (potential investors and buyers), identified, contacts enabled by the Georgian diaspora persons, that have contributed to generating the new business linkages for export development.

UNDP, FAO and UNIDO participated in the individual meetings with diaspora persons, identified by these agencies from the IOM provided diaspora profiles, to support newly created CMOs and their member businesses. As a result of these efforts, IOM, jointly with FAO and UNDP, has initiated three diaspora assignments.

Delays in implementation, challenges, lessons learned & best practices

Delays:

Due to the COVID-19 pandemic and restrictions over international and local travels, some delays for the project occurred, including:

1. In the fourth quarter of 2020, UNIDO aimed to organize awareness seminars targeting institutional stakeholders and identified potential cluster members to sensitize them on the available policies and support schemes (Activity 1.3.2). However, as such events ask for more face-to-face meetings and physical presence, UNIDO opted to organize awareness-raising seminars once results of all cluster diagnostic studies are available and restrictions are fully lifted. This wasn't possible in 2021, thus activities will commence in 2022.
2. Upon finalization and validation of all eight initially planned cluster diagnostic studies in April 2021 (the initial plan was to finish all eight studies by the end of 2020), UNIDO in close consultations with selected pilot clusters (Georgian Marine Fishing Cluster and Georgian Pharmaceutical Cluster) has agreed on the cluster level collective activities only in June/July 2021 instead of initially planned December 2020/January 2021. This resulted in several months of delay in identifying and agreeing on concrete activities. However, this was eventually successfully achieved and the budget revision also was approved by the EU to reflect better the cluster needs. The newly introduced sub-activities are concentrated under Activity 1.5: Two pilot clusters strengthened, thus, the funds, which were saved due to the COVID-19 pandemic, were transferred from other Activities to Activity 1.5 in order to implement identified collective activities.

3. Indicator 2.5. Because the Specific EPR legislation for packaging waste has not yet been approved, the assumptions for the following description are based on the most recent draft provided by the Ministry of Environmental Protection and Agriculture, which is the author and initiator of the EPR legislation in Georgia.

The main challenge for the PMAG CMO team for 2021 concerns the internal strengthening of the team, team building, competencies development in terms of communication and negotiation capacities to provide successful negotiations with potential members and to provide business-oriented (technical and financial) discussions with members. Also, the launching of joint initiatives with cluster members following the introduction of the EPR policy for packaging. Thirdly the COVID-19 pandemic has been shaking up various supply chains. Joint efforts related to internationalization could result in a strengthened position for Georgian packaging producers in the neighbouring countries.

4. Indicator 4.2 The started work with the regional and local authorities on mainstreaming migration into local development could not continue in the reporting year, due to the Covid restrictions, specially hitting hard the Imereti region and is planned to be organised in 2022.

5.

Indicator 4.3 The two Diaspora forums/networking events in Georgia, were organized first time in Georgia in close cooperation with the Diaspora Relations Department, MFA and President of Georgia's support. These events have provided the opportunity to Georgian Diaspora get acquainted with the investment and entrepreneurial environment in Georgia; through virtual buyers' mission, enabled with the support of the Georgian diaspora, Georgian producers were able to connect with potential international buyers and generate new business linkages for export development. IOM Georgia is planning a follow-up networking event in one of the selected EU countries, to connect Georgian SMEs from different industries and sectors, including food and beverage sector and pharmaceutical industry, with internationally oriented investors, considering investment in Georgia and to support in creation of valuable business connections with the Georgian Diaspora from different EU countries.

However, with the present crisis in Ukraine, sending the shockwaves through markets and financial sector across the Europe might make it difficult to arrange the initially planned roadshow of the selected Georgian businesses (packaging, pharmaceutical clusters) with the different investment funds (equity funds, guarantee funds, debt funds and/or alternative financing schemes) as identified through the diaspora assignment and planned for May 2022. In light of the above, IOM has to postpone the event and organize it in the proposed extension period (until December 2022).

Lessons learned:

- **Trust building and expectations:** PMAG cluster member companies are gaining more experience and confidence in the cluster initiative. The presence of older members facilitated newcomer integration and laid the groundwork for an open and cooperative

(among competitors) attitude. Gradually, through workshops and experience sharing, they became accustomed to collaboration among organizations in a cluster environment, which means the art of interacting with other organizations in a broader dimension than just the client-supplier relationship, and, most importantly, they began to trust each other. UNDP encouraged women's participation in cluster development activities, which aided in the development of trust among member companies.

- **Common interests of cluster companies:** It was understood that the significance of supporting industries is explicit for PMAG cluster member packaging companies. Forward and backward linkages are critical in every industry, including packaging. The packaging industry's impact is channelled through an efficient supply chain in order to add value and meet steadily increasing customer demands.
- **Institutional development:** In 2021, the management team was active in assisting companies and demonstrating the added value of their inputs. As a result, the strategy called for the CMO's institutional capacities to be strengthened by increasing the CMO staff's management skills and competencies, as well as strengthening business service development and delivery.
- **Strategy development:** On the basis of Analysing the individual needs of each manufacturer and user of the packaging materials within a cluster environment, UNDP translated these needs into a strategy, common initiatives, and issues to be addressed.

Challenges:

1. Building a cluster is a continuous process. It is important to continue nourishing trust-building and spreading it to a wider spectrum of companies in Tbilisi and other regions. The pandemic circumstances hampered in-person interactions for company representatives, facilitating the detachment of new and old cluster member companies and the formation of subgroups within the cluster. Furthermore, the cluster brings together packaging companies of varying sizes and stages of development, posing an additional challenge for cluster management in establishing and maintaining trust among members. Within the common interests and integrating supporting industries more into the processes, these challenges were identified: Consumers are dissatisfied with the limited variety of packaging material designs available, and manufacturers do not offer innovations or take a proactive approach. There is a need of the more active involvement of supporting industry representatives in the creation of packaging in Georgia. The entire product development cycle has to be planned, with the participation of representatives from the supporting sectors.
2. The key obstacle for the CMO team in 2021 is internal team strengthening, team building, and the advancement of competencies in terms of communication and negotiation capacities to provide successful negotiations with potential members and business-oriented (technical and financial) discussions with members. In addition, following the implementation of the EPR policy for packaging, joint initiatives with cluster members will

be launched. Third, the COVID-19 pandemic has caused havoc in a variety of supply chains. Joint internationalization efforts could result in a stronger position for Georgian packaging producers in neighbouring countries.

3. Challenge remains sustainability of cluster, filling financial gaps of operational expenses and delivering value-adding services for maintaining membership and increasing coverage
4. Support PMAG to execute its strategy to address challenges existing in the industry, still valid, specifically:
 - a. Modernizing the machine park to guarantee quality, repeatability and price competitiveness of products offered on the market.
 - b. Developing competencies among employees, at management and operational functions levels (e.g., accounting, sales, human resources) and at the production level (operators, maintenance personnel, production planning and optimization).
 - c. Strengthening cooperation in material buyers' groups will enable them to buy materials at a lower price on the international market.
 - d. Strengthening cooperation in sales platforms will create more complex services and product portfolios and will flexibly meet the requirements of niche segments.
 - e. Reaching conformity with international standards and certification requirements (food safety, EPR).
 - f. Coping with environmental issues concerning water and air pollution, health and safety issues, waste recuperation and recycling in order to reach conformity with international standards.
 - g. Improving insight into new technologies and developing packaging solutions, including active packaging (gas scavengers, corrosion control, moisture control, antimicrobial), intelligent packaging (sensors, codes, tags, tracking devices, time-temperature indicators), edible packaging, soluble packaging, antibacterial packaging, self-cooling and self-heating packaging, multisensory packaging and non-stick packaging.
 - h. Strengthening cooperation with downstream industries in Georgia on the development of tailor-made solutions for the international market in the food and chemical sectors.
 - i. Increasing the presence in the international markets, especially in the EU and the Black Sea area, Caspian Sea area and Gulf area.

Qualitative assessment

UNDP: The activities of UNDP were planned and implemented with relevant government and non-government stakeholders:

- The project continued partnerships with local and regional authorities of the Imereti and Kakheti regions; MEPA and its Agriculture and Rural Development Agency; and MoESD and its agency responsible for entrepreneurship support, Enterprise Georgia.

- UNDP actively cooperated with FAO, within the nursery and PMAG cluster rapprochement.
- UNDP actively cooperated with IOM for involvement in diaspora activities.
- International partnerships have been established and enhanced as already discussed.

IOM: The most important issue for highlighting is the established communication with the Georgian diaspora and IOM, backed with the diaspora-related initiatives. The partnership with the government agencies - Enterprise Georgia, GITA, RDA, Agency of Mines, State Property Agency, other state agencies, was extraordinary in the planning stage of the Diaspora Economic Forum. IOM actively cooperated with the President's Administration, as the Diaspora Economic Forum was fully supported by the President of Georgia. IOM successfully cooperated with the partner UN Agencies, exceptionally by supporting CMOs through joint temporary diaspora assignments.



A UN system-wide
service hosted by



ii) Indicator Based Performance Assessment:

	<u>Achieved</u> Indicator Targets	Reasons for Variance with Planned Target (if any)	Source of Verification
Outcome 1 Enhance entrepreneurship and business sophistication by strengthening the capacities of government and local entities to develop and operate clusters and supporting companies directly with strategic investments while also demonstrating the effectiveness of these strategies to businesses Indicators: 1. # of identified potential clusters Baseline: 0 Planned Target: 10 2. Growth rate of selected clusters' members' turnover Baseline: 2018 output data Planned Target: 20% growth 3. Balance of trade in selected sectors Baseline: 2018 sector balance of trade Planned Target: 10% improvement (higher exports or lower imports)	1. 57 emerging and potential clusters 2. Turnover of the packaging cluster members for 2021 increased by 53.8% compared to 2018 3. For 2021 balance of Trade for the packaging (plastic and paper) sector improved by 22.9% compared to 2018		Report "Mapping Emerging and Potential Manufacturing and Agri-Business Clusters in Georgia", February 2020 Project Report UNDP: "Packaging Sector Study Report 2021" (includes survey of companies and available public data sources, GeoStat
Indicator 1.1 Cluster mapping undertaken based on prioritization criteria set with local counterparts Baseline: 0 Planned Target: 1 (Achieved 100%)	UNIDO. 1.1. First of its kind comprehensive mapping of 57 manufacturing and agri-business clusters in Georgia		Report "Mapping Emerging and Potential Manufacturing and Agri-Business Clusters in Georgia" Press clips Conference reports

<p>Indicator 1.2 No of emerging and/or potential clusters detailed diagnostic studies by the programme</p> <p>Baseline: 0 Planned Target: 8</p>	<p>UNIDO. 1.2. First-of-its-kind 9 cluster diagnostic studies conducted</p>	<p>UNIDO has conducted an additional cluster diagnostic study for the greenhouse in the Imereti region upon request from MEPA</p>	<p>Cluster Diagnostic Studies</p> <p>Project reports</p>
<p>Indicator 1.3 No of institutions and people trained on cluster mapping and diagnostic (% of women)</p> <p>Baseline: N/A Planned Target: 5 institutions; 30 people (male/female – TBI) (Achieved 50%)</p>	<p>UNIDO. 1.3. 30 persons, including 13 women (43%), from 10 organizations were trained on clusters with a focus on diagnostics and action planning for cluster sustainability (<i>MoESD, Enterprise Georgia, MEPA, RDA, Scientific-Research Center of Agriculture, UNDP, FAO, Packaging Association, PMCG Research, TBSC Consulting</i>)</p>	<p>N/A</p>	<p>Training Report</p> <p>Project reports</p>
<p>Indicator 1.4 # of cluster activities realized in pilot clusters identified through the diagnostic</p> <p>Baseline: 0 Planned Target: 2</p>	<p>UNIDO. 1.4. This indicator will be achieved in 2022</p>	<p>N/A</p>	<p>Project reports</p> <p>Press clips</p>
<p>Output 2 Development and functioning of the clustering approach in the packaging and seeds/seedling (UNDP Georgia and FAO)</p> <p>Indicator 2.1 Number of CMOs that are operating in the packaging and seed and seedling sectors</p> <p>Baseline:0 Planned Target :2 (in total for UNDP and FAO)</p>	<p>UNDP: 2.1. 1 in the packaging sector (with 3 representations in the Imereti, Kakheti and Tbilisi Regions), FAO: 2.1. CMO for the seeds and saplings sector has been created and is actively operating.</p>	<p>N/A</p>	<p>FAO: Registration of the Association on 4 January 2021 as a Non-commercial legal entity in the public service hall and an extract from the registry.</p> <p>UNDP: Project Report and Cluster member web page: http://pmag.ge/en/13-memberscat</p>

<p>Indicator 2.2 No of companies who are part of the CMOs in the packaging and seed and seedlings sector Baseline:0 Planned Target: At least 50 (in total for UNDP and FAO) (at least 10 % women-led)</p>	<p>UNDP: 2.2. The PMAG Packaging Cluster has 92 members 27 companies are full members (packaging producers), 55 are associated members and 10 are honorary members from different parts of packaging value chain. In addition, Women manage 20% of member companies or co-manage by women at a cluster member companies' level.</p> <p>FAO: 2.2. Number of nurseries members of the Georgian Seeds and Saplings Association (GEOSSA): 21 confirmed members, among them two are women lead.</p>	<p>N/A</p>	<p>UNDP: Project Report and Cluster member web page: http://pmag.ge/en/13-memberscat</p> <p>FAO: GEOSSA database</p>
<p>Indicator 2.3 No of inter-firm collaborative initiatives/projects undertaken between the CMOs' members Baseline:0 Planned Target: At least 10 – for reporting period - (in total for UNDP and FAO)</p>	<p>UNDP: 2.3. results started arriving from 2021 reporting period (packaging sector): Five activities were initiated and supported in 2021 in the packaging cluster.</p> <p>FAO: 12 cluster activities successfully carried out in support of GEOSSA members and seed/fruit value chain stakeholders</p>	<p>FAO: 2.3 Number of inter-firm collaborative initiatives/projects undertaken between CMOs' members: planned for Year 2021</p>	<p>UNDP Project Report</p> <p>FAO: Different sources, such as photos, records of interviews, newsletter publications, presentations and others.</p>
<p>Indicator 2.4 % of self-financing of CMO in packaging Baseline:0 Planned Target: At least 30% (does not include donor funding)</p>	<p>UNDP: Achieved. over 30% of self-financing annualized; adjusted just for operational costs; 82 member companies financing volume is over GEL 100,000 annualized for 2020; annualized operational costs are approximately GEL 200,000.</p>		<p>UNDP: Project Report</p>
<p>Indicator 2.5 CMO in packaging cluster facilitates EPR implementation in packaging</p>	<p>UNDP: On track, legal analysis and CMO tasks in implementing the EPR are</p>	<p>UNDP: EPR 1 Development of the EPR related legislation is ongoing in Georgia. The</p>	<p>UNDP: Project Report</p>

Baseline: No Planned Target: Yes	<p>identified, based on current draft law ("Waste Management Code "). UNDP closely follows processes to align its activities according to developments: approval of the Law</p>	<p>Government has approved Technical Regulations for 4 out of 6 EPR specific waste streams. They are WEEE, waste oils, waste tires, waste batteries and accumulators. Two more Regulations (for packaging waste and ELVs) are being currently reviewed by the Governmental Institutions and the key stakeholders, there is no concrete decisions made</p>	
Indicator 2.6 No of priority needs solved in CMOs Baseline: No Planned Target: 20 (in total for UNDP and FAO)	<p>UNDP 2.6. On the track, 14 needs solved in 6 areas</p> <p>FAO: 2.6. 7 priority needs solved for the CMO, including technical assistance, trainings on critical needs and procurement of production material and equipment.</p>	<p>FAO: Number of priority needs solved in CMO planned for Year 2021</p>	<p>UNDP Project Report</p> <p>Documentation on the priority needs and progress reports from GEOSSA.</p>
Indicator 2.7 Seedling Certification System approved and operational Baseline: NO Planned Target: YES	<p>FAO: 2.7 Seedling certification system designed and approved by the Georgian government in 2021 and to enter in force in 2024</p>		<p>FAO: 2.7. Ordinance of the Government of Georgia available on the legislative herald of Georgia, as released on 28 September 2021</p>
Indicator 2.8 Seed Association created Baseline: 0 Planned Target: 1	<p>FAO: 2.8 Seed association was created as part of GEOSSA</p>		<p>FAO: 2.8. Registration of the Association on 4 January 2021 as a Non-commercial legal entity in the public service hall and an extract from the registry.</p>
Indicator 2.9 Number of nursery operators registered and selling certified nursery material Baseline: 0 Planned Target: 25 (at least 10% women –led)	<p>FAO: 2.9 2 nurseries earned CAC qualification on a voluntary basis.</p>		<p>FAO: 2.9 CAC certificates.</p>
Indicator 2.10 The creation of multi-stakeholder platform for seeds and seedlings Baseline: 0 Planned Target: 1	<p>FAO:2.10 multi-stakeholder platform for seeds and saplings created on Viber and actively operational.</p>		<p>FAO: 2.10 Multi-stakeholder platform on Viber.</p>

<p>Output 3 Packaging and seeds/seedlings clusters enhanced through strategic investment (UNDP)</p> <p>Indicator 3.1 No of jobs supported/sustained by the EU (UNDP and FAO) Baseline:0 Planned Target: At least 30</p> <p>Indicator 3.2 No of companies expanded sales at least by 15% (UNDP and FAO) Baseline:0 Planned Target: At least 10</p> <p>Indicator 3.3 No of quality schemes adopted by economic operators with EU Support (UNDP and FAO) Baseline:0 Planned Target: At least 8</p>	<p>3.2 23 (45) PMAG Packaging Cluster member companies have increased sales at least by 15%</p>	<p>UNDP: Indicators 3.1 and 3.3 to be achieved in the years 2021 and 2022</p> <p>FAO: Indicators, 3.1, 3.2 and 3.3. Result expected in year 2022</p>	<p>UNDP Packaging Sector Study Report 2021 (includes survey of companies and available public data sources)</p>
<p>Output 4 Migration is a mainstream component of SME development support (Resp. IOM)</p> <p>Indicator 4.1 Diaspora mapping conducted, interests, and priorities for investment identified and presented to the partner agencies for further consideration Baseline: No Planned Target: Yes</p>	<p>Inventory with over 2000 diaspora business and professional profiles Over 200 diasporas made aware of packaging clusters and Seeds and Seedlings Association</p> <p>Diaspora mapping was conducted. 2,640 individual diaspora profiles were developed and outreached. To date 368 active profiles, developed. based on expressed responses have expressions of cooperation interested with the Georgian state, and private sector. 215 out of indicated filled in the online survey form. Almost the majority 90% indicated in the form that is interested in B2B interest and further networking supported between foreign buyers (Georgian diaspora supported contacts)</p>		<p>Diaspora professional profiles inventory</p> <p>Diaspora Profiles Inventory Diaspora Survey Report</p>

	identified and packaging cluster member food and beverage producers initiated.		
Indicator 4.2 Number of Trained Staff of Central and/or local authorities in mainstreaming migration into local development Baseline:0 Planned Target: 30	Started in the previous reporting period, to be continued in 2022		Agenda of the meetings with the representatives of the admin-territorial units of the Municipalities. Diaspora web portal, http://gda.ge/pages/sainvestitsio-shesadzleblobebi and http://gda.ge/pages/kartuli-diasporis-ekonomikuri-forumi-2021
Indicator 4.3 Networking events and/or trade fairs in Georgia and EU Baseline: 0 Planned Target: 3	2 Diaspora networking events, in total 220 attended, from more than 20 countries; 76% expressed interest in finding business partners.		Diaspora Economic Forum Agenda, list of participants. Presentation materials available at the WWW.GDA.GE portal. Forum survey analysis and plan of action. Networking Event Agenda, list of participants, report.
Indicator 4.4 No of qualified Diaspora assignments for CMOs and/or companies capacity building purposes Baseline: 0 Planned Target: 4	3 assignments were developed in cooperation with FAO and UNDP		Assignment contracts, TORs, consultant reports

iii) A Specific Story

UNDP: UNDP promoted sustainable businesses and supported businesses in terms of internationalization, capacity development, establishment of cooperation with international partners, implementation of innovative technologies and tools, development consulting and coaching, training, implementation of extended producer responsibilities, and environmentally friendly practices. The Packaging Cluster and its assistance have played a significant role in “Tavtukhi's” growth from a small enterprise to a major breadmaking company. The owner of the company, Mzia Bendeliani, initially thought the cluster would help her improve product packaging. However, the assistance the company received was far more varied, including educational and consulting services, networking opportunities, expert mentorship, catalog creation, and other services. This opportunity to become better educated and trained piqued my interest as someone who is always looking for new things to learn.

Once Mzia Bendeliani decided to return to the Georgian city of Kutaisi after a 12-year absence in Greece, she encountered a problem: she couldn't find good-quality bread anywhere in the city. Bendeliani took on the task of creating delectable bread on her own. After purchasing bakery ovens, the Georgian entrepreneur began producing loaves of healthy bread, and has since provided high-quality products to Kutaisi for five years in a row. In response, to the UNDP support, initially using up to five kilograms of flour per day, the Tavtukhi team now bakes bread with 500-600 kilograms of flour. Their advantage stems from the use of common Georgian wheat varieties, which have been used to make bread in the region for centuries. The grains are grown in Georgian soil with only biofertilizer. Furthermore, the bread is baked using an ancient traditional method based on raw yeast and does not contain any artificial or chemical additives, only intensive yeast. Tavtukhi bread is now available in almost all market chains in Kutaisi, and it has a large number of satisfied customers.

Bendeliani hosted an intern for three months as part of the internship program. She believes that this is an excellent opportunity for young people to learn about manufacturing and gain hands-on experience. In exchange, the entrepreneur receives new ideas and human resources that are beneficial to the business.

Cluster support services also include joint purchases, which reduces the service fee for entrepreneurs. Imereti companies (members of the cluster) hired a photographer to take photos at the beginning of the month, and Bendeliani is now looking forward to the catalogue to provide customers with information about her products. She believes it will have a positive impact on the company's image.

FAO: Currently, the Georgian plants and perennial fruit saplings market is contaminated with saplings and plant materials infected with viruses, diseases and nematodes, jeopardizing productivity at farm level. Furthermore, traceability mechanisms at nursery level are absent, making varietal identification and determination of trueness to type frequently impossible for customers.

The underperformance on the nursery level affects the farming and the rest of the core value chains negatively throughout the country, with damaging spill-over effects on the Georgian fruit sector in general. Predictably, farmers frequently complain about infected saplings, high sapling death rates, low yields and low fruit quality, severing and undermining trust relations between nurseries and farmers. Nurseries, on the other hand, complain

about high sapling return rates and strained relations with the state ‘Plant the Future’ program, which obliges the nurseries to recall their saplings at the request of beneficiary farmers.

The main reason for the under-delivery of nurseries in Georgia is weak and non-reliable rootstock production for both fruit saplings and grapevines. The lack of availability of mother rootstocks is a derivative of a technical complexity, associated with the correct maintenance of elite mother rootstocks, to be used for vegetative propagation and insufficient measures to fend off contamination with viruses and pests. Production of healthy vegetative material requires correct management and maintenance of nurseries and mother-blocks. This is a challenge, both from the infrastructural and technical perspectives, requiring large financial investment and careful management systems to nourish mother rootstocks in adherence to the international standards, while isolating them from pests and carrier bugs, which can easily transport and infect the plants with viruses.

FAO, through its EU Innovative Action for Private Sector Competitiveness (UNJP/GEO/013/EC) program intervention, has approached this problem from two sides to support the private sector. One is the establishment of mother-block screen house facilities in Jighaura and the other is the establishment of the first association for seeds and sapling producers in Georgia – Georgian Seeds and Saplings Association (GEOSSA).

The Jighaura screen houses and mother-block demonstration plots produce and preserve healthy mother rootstocks and scion cuttings that are free from pests and viruses. The purpose of the Jighaura facilities is to store a live collection of plants of different varieties, preserved under strictly controlled conditions in its screen houses. This way, Jighaura bank secures the genetic purity of the varieties, serving as a model for technology transfer to other nurseries and mother blocks to produce healthy vegetative material in full compliance with the CAC (*Conformitas Agraria Communitatis*) requirements. Furthermore, there is a potential of creating a scheme with which such CAC-compliant rootstocks and scions can be distributed, or sold to private nurseries. This way, nurseries will have access to domestically produced propagating planting material, free from pests and viruses, together with the necessary paperwork, as required by the CAC standard for commercial multiplication. Such a move will bring fruit sapling producers and grapevine nurseries closer to the CAC standard, which will be a step towards modernization of the whole fruit and grape sectors.

The aforementioned intervention was combined with the support that the program provides to nurseries through GEOSSA. Such support has manifested itself in various ways, among them are:

- ✓ Consultations in the direction of infrastructural and management changes are needed to ensure compliance with the CAC standard.
- ✓ Reinforcing nurseries with much-needed grafting equipment, planting equipment and production materials.
- ✓ Nurseries have gained access to healthy basic-level propagating material and grafting materials for pome and stone fruit saplings.
- ✓ Support given to the N(N)JP Agroservice Center of the Adjarian government to establish a screen-house of its own (similar to the Jighaura facilities) for cultivating and distributing citrus mother-plants throughout the region - also giving GEOSSA access to its basic-level buds to be grafted on rootstocks.

The intervention has brought several high-profile nurseries closer to CAC standards. Two nurseries in Georgia have voluntarily complied to the CAC standard already and more are on their way to full compliance for the first time in the recent history of Georgia.

The program intervention has made it clear that for such types of interventions to be brought to fruition successfully, it is necessary to organize them through a bottom-up approach, rather than through top-down imposition. FAO engaged in an intensive collaboration with both nurseries and orchard owners before the establishment of the Association and before its roles and duties were decided. Through conversations and interviews with sapling producer nurseries and farmers, it became clear that the sector needed intensive support vis-à-vis infrastructural restructuring, and access to technical knowledge, technologies and equipment. Nurseries were happy to comply with the CAC standard if they received such support from FAO and the Association. It was made clear that the establishment of the mandatory floor of standards for sapling production was in the interests of both nursery owners and farmers. Nursery owners, that were previously undermined by the availability of sub-standard saplings on the market (introduced by petty nurseries and traders), were happy about such initiative because the CAC standard equalizes the competition on the market by subjecting all sapling producers/traders to the same quality and management standards. Similarly, perennial fruit orchard owners were very accepting of such an initiative also, since they will soon have access to healthy planting materials for their gardens, with assurances over varietal purity, trueness to type and disease-free materials.

III. Other Assessments or Evaluations

Below is the list of various reports, assessments and evaluations, as well as reviews attached to this report.

Annex 1	UNDP Detailed Actions Performance 2021
Annex 2	FAO Detailed Actions Performance 2021
Annex 3	IOM Detailed Actions Performance 2021
Annex 4.	UNIDO Detailed Actions Performance 2021
Annex 5	UNDP Occupational Safety Audit
Annex 6	UNDP Internship Project Report
Annex 7	UNDP Sales Channel Stimulation Study Part 1
Annex 8	UNDP Sales Channel Stimulation Study Part 1 Presentation;
Annex 9	UNDP Sales Channel Stimulation Study Part 2;
Annex 10	UNDP Packaging Materials Manufacturers Study
Annex 11	UNDP Packaging Materials Manufacturers Study Presentation
Annex 12	UNDP Packaging Materials end Users Study
Annex 13	UNDP Packaging Materials end Users Study Presentation
Annex 14	UNDP Study of the Market of Packaging Materials
Annex 15	UNDP The Survey of Plastic and Biodegradable Bags Manufacturers Presentation
Annex 16	UNDP Legislative Approximation with EU in Packaging Sector Study Presentation
Annex 17	UNDP Qualitative Study Report on Green / Processing Sector Diagnostics
Annex 18	UNDP Packaging Technology and Circular Economy Guidebook
Annex 19	UNDP Packaging Sector Study 2021

Annex 20	UNDP WPO Packaging Design for Recycling in Georgian
Annex 21	UNDP Study Tours 2021 Report
Annex 22	UNDP Strategic Investments for Growth for Companies in The Packaging Supply Chain Report for Kakheti Lot
Annex 23	UNDP Recommendations on Inter-Cluster Linkages and the Internationalization of the Packaging Cluster
Annex 24	UNDP List of Machine Suppliers
Annex 25	IOM Diaspora Survey Report
Annex 26	UNDP Study on the Needs of Employees Working for Manufacturers of Packaging Materials Presentation
Annex 27	UNDP Study on the Needs of Employees Working for Manufacturers of Packaging Materials
Annex 28	UNDP Packaging Materials Supporting Sectors Study
Annex 29	UNDP Study on Market of Packaging Materials
Annex 30	IOM Diaspora Economic Forum List of Participants
Annex 31	IOM Diaspora Economic Forum Agenda
Annex 32	IOM Diaspora Business Networking Event Agenda
Annex 33	IOM Diaspora Networking Event Consultancy Report
Annex 34	IOM Diaspora Business Networking List of Participants
Annex 35	IOM Diaspora Economic Forum Press Release
Annex 36	UNIDO Cluster Diagnostic Study Wine
Annex 37	UNIDO Cluster Diagnostic Study Toys
Annex 38	UNIDO Cluster Diagnostic Study Poultry
Annex 39	UNIDO Cluster Diagnostic Study Greenhouses
Annex 40	UNIDO Cluster Diagnostic Study Jewellery
Annex 41	UNIDO Cluster Diagnostic Study Fruit and vegetable processing cluster with a focus on hazelnuts
Annex 42	FAO Assessment of Export Potential for Georgian Saplings
Annex 43	FAO Insurance Needs Assessment for Georgian Nurseries
Annex 44	FAO Cluster Development Strategy
Annex 45	FAO Promotion Strategy for Certified Plants
Annex 46	UNJP 2021 Communication and Visibility Report
Annex 47	UNJP Risks Update 2021
Annex 48	UNJP Workplan 4 Year: UNIDO, UNDP, IOM, FAO

IV. Programmatic Revisions (if applicable) N/A

After programmatic revisions are due to the obstacles, which led to challenges and opportunities for the finalization of the project activities within 2021, the extension of the project for 6 months (1 February – 31 July 2023) is needed for achieving the core outcomes of the project. Key objectives to be achieved by the project extension is to support selected clusters with the implementation of the collective activities identified through

extensive studies; Also support nurseries in the production of high quality, disease-free, traceable planting material for the implementation and achievement of CAC certification.

The rationale behind the extension of the project is as follows:

- The initial plan for **UNIDO** was to finish all cluster diagnostic studies in November 2020; however, the deterioration of the epidemiological situation and travel restrictions did not allow it: the cluster diagnostic studies were finalized only by April 2021. Since March 2019, the COVID-19 pandemic has limited opportunities for smooth implementation of the project activities, which has led to delays in the completion of the cluster diagnostic studies. UNIDO could not start identifying pilot clusters for direct support without cluster diagnostic studies. Thus, only in May 2021, UNIDO, in consultations with the Ministry of Economy and Sustainable Development, LEPL Enterprise Georgia and the Ministry of Environmental Protection and Agriculture, selected pilot clusters for cluster-level interventions: Georgian Marine Fishing Cluster and Georgian Pharmaceutical Cluster.
 - Trust-building among cluster members is of utmost importance for the sustainability of the cluster interventions. Due to delays associated with COVID-19 and respective selection of the pilot clusters, **UNIDO** managed to initiate a discussion with selected clusters in regard to the identification of collective activities that clusters could put in place and work plan validation with the identified cluster stakeholders only in June – September 2021, which is a delay of more than 6 months compared to an initial project workplan. Trust-building among cluster members and implementation of collective activities are also time-consuming, which cannot be fully realized by the end of January 2023 in line with current project timelines. This asks for the extension of the project activities for 6 months in order to secure sustainability and the long-term positive impact of UNJP interventions in the selected clusters.
 - As for **UNDP component related to support EPR implementation**, the national regulation and legislation framework formation did not progress in 2021 as well the national consensus on EPR-related regulations has not been achieved yet. Even though the exact deadlines for implementing EPR regulations packaging component are not known, the largest producers (such as soft drinks producers), have registered the PRO organization, has not authorized by regulator in absence of such regulations. In the circumstances of the nonexistence of the regulations, UNDP is capable of preparing these organizations theoretically, strengthening their capabilities and supporting Georgian packaging sector businesses to comply with upcoming EPR regulations adopting regulation. For instance, the inventarization of plastic waste could be initiated and implemented for different cities, or raise awareness and conduct workshops about the PRO integrated systems based on the best practices of several other countries. As the scope and structure of the upcoming EPR regulations are not explicit, it is recommended to discuss several country cases that are the best fit for the Georgian Environment. More time is needed for the processes to mature and for the UNDP to be able to implement more complex and important interventions not only at the national level but also at the subnational level and across multiple actors. This is critical for the system's and circular processes' development.
 - The significant increase in the number of PMAG packaging cluster companies has led to forming subgroups that serve as the bases for inter-cluster division. Instead of there is a need of reorganization of the cluster in
-

the direction of strengthening of autonomy of the regional clusters for effective stimulation of further cluster development initiatives. This reorganization and relevant support from the Project will need more time to mature the new entities.

- The project conducted the screening process for the implantation of strategic investment, with the purpose to reach the maximum number of potential applicants. The screening was implemented in two stages: The idea generation and concept screening was conducted as a first stage by **UNDP** and PMAG representatives and full technical screening - as the second stage by implementing partners. In total 141 applications for both stages. In between, UNDP arranged the business model generation training and individual coaching for the businesses in Kakheti, Imereti and Tbilisi. The trainings were provided to 154 representatives of 112 companies (out of which 67 were representatives of 57 grant applicant companies); Individual coaching was provided to 48 companies (out of which 37 were grant applicants). The above-mentioned process intended to generate a relatively high quality and volume of grant applications and to enable the Project to select the best possible applications took additional several months. It is worth mentioning to consider logistical problems deriving from the pandemic; since most of the equipment comes from overseas, it is a priority to take extra actions and precautions to minimize risks, general terms of delivery of equipment are dramatically increased.
- The approval of the decree establishing the minimum requirements for nurseries (**FAO**) to produce local saplings was only approved at the end of 2021, leaving very little time for the nurseries to be able to implement the changes to meet minimum standards on CAC. Although a significant part of the work was advanced, six more months of implementation would allow to give more time for the nurseries to graft and sell the first certified materials in the first part of 2023. The concept of the cluster has been difficult for nurseries to understand, and extra 6 months would allow better integration of the concept of CMO in the day-to-day activities of the private nurseries and strengthen the role of GEOSSA as a partner that agglutinates the sector.
- IOM maintains its operations, supporting the project with a diaspora component within the project and it is needed to maintain the component for agency support till the end of 2022.