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Executive Summary

Highlights 2018

Progress

On track with all committed sustainability targets

- 29 percent* lower sulfur emissions from viscose production

The Lenzing Group signed the Fashion Industry Charter for Climate Action committing it to a reduction in aggregate greenhouse gas emissions of 30 percent by 2030**

- Investment of more than EUR 100 mn in sustainable production technology by 2022

Sustainable Innovations

- Investment of up to EUR 30 mn in a pilot plant producing TENCEL™ Luxe branded filaments

- Nonwovens: market launch of pioneering LENZING™ Web technology

- Raw material security: Together with a joint-venture partner Lenzing plans to build a dissolving wood pulp plant in Brazil with an annual capacity of 450,000 tons

Achievements

- Lenzing ranks 1st in Canopy’s Hot Button Report

- Lenzing improved its ESG ratings: MSCI (BBB to A)

- VÖNIX: Lenzing best rated company in Austria

- New branding concept supports long-term business success

- Textile Exchange Report: LENZING™ fibers listed as “Preferred Fibers”***

Awards

- 2018 Austrian State Prize for Smart Packaging awarded to Packnatur® reusable wood-based bag****

- ASRA award for Sustainability Report 2017*****

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* CS₂ and H₂S, baseline 2014
** Baseline 2017, in scope 1, 2 and 3; see https://bit.ly/2LfaeXA
**** Awarded by Federal Ministry for Digitization and Business Location of Austria; Packnatur® reusable cellulose bags were developed together with VPZ Verpackungszentrum GmbH.
***** Awarded by the Chamber of Public Accountants and Tax Consultants
Dear Ladies and Gentlemen,

Sustainability is the dominant issue of our times. The textile industry has a particularly large impact on the economy and the environment. It makes a major contribution to global value creation, but it also leaves a very sizable ecological footprint.

In order to find solutions to these challenges, pioneers and role models are required. And Lenzing is one of them. Our business is based on the circular economy model. We use the renewable, entirely certified or controlled raw material wood to produce dissolving wood pulp in our biorefineries.

Our leadership responsibility also includes our commitment to global taxes on CO₂ emissions and the introduction of science-based targets. These are both initiatives that Lenzing will address in the coming months.

Achievement of these ambitious goals calls for the commitment of all Lenzing Group employees and our partners, as well as customers along the value chain.

Yours

Stefan Doboczky
Chief Executive Officer of the Lenzing Group
The sustainability strategy of the Lenzing Group

“Naturally positive”, the Lenzing Group’s sustainability strategy, was developed based on the results of the materiality analysis and is firmly rooted in the Lenzing Group’s Core TEN strategy.

The strategy is based on the three pillars Partnering for systemic change, Circularity and Greening the value chain. It defines seven main challenges (focus areas) where the Lenzing Group substantially contributes to creating positive impacts and benefits:

- Raw material security
- Water stewardship
- Decarbonization
- Sustainable innovations
- Empowering people
- Partnering for systemic change
- Enhancing community wellbeing

Lenzing Group sustainability strategy “Naturally positive”
Managing sustainability

Lenzing Group Sustainability targets

In 2017, Lenzing set Group sustainability targets for the most important challenges arising in its strategic focus areas – read about our progress in 2018:

**Sustainable innovations**

**Target**

To improve the Lenzing Group’s specific sulfur emissions by 50 percent by 2022

To achieve the overall target by 2022, Lenzing is preparing a major investment for an additional Carbon Disulfide Adsorption Plant (CAP) at its production site in Indonesia.

Technical improvements have already produced initial reductions in sulfur emissions of 29 percent compared to the basis year 2014.

**Water stewardship**

**Target**

To improve Lenzing Group’s specific wastewater emissions by 20 percent by 2022

Efforts in 2018 focused on two production sites, namely in Purwakarta, Indonesia and in Grimsby, UK. At both sites, extensive improvement measures were taken and investment preparations made to bring COD values to target by 2022.

**Raw material security**

**Target**

To implement conservation solutions

In 2018, the Lenzing Group initiated a forest conservation project in Albania (Southern Europe). It aims to support the development of rural areas in Albania with a special focus on the broader region of Shkoder (Ana e Malit) and Diber (Peshkopi) by using natural resources in a sustainable manner as well as fostering alternative income possibilities for the communities. Lenzing will start afforestation and education activities in 2019.

**Decarbonization**

The Lenzing Group signed the Fashion Industry Charter for Climate Action

The Charter was supported by 43 heads of the fashion industry, committing to a 30 percent reduction of aggregate greenhouse gas emissions in scope 1, 2 and 3 by 2030. It was published in Katowice, Poland at the UNFCCC climate conference in December 2018.

A science-based target for the Lenzing Group is being prepared.

**Partnering for systemic change**

**Target**

To assess the sustainability performance of 80 percent of the Lenzing Group’s “most relevant suppliers” by 2022

By the end of 2018, 63 percent of the most relevant suppliers were assessed.

**Partnering for change**

**Target**

To improve transparency by implementing the Higg Facility Environmental Module (FEM 3.0) at all sites by 2019

In 2018, Lenzing started to implement Higg FEM 3.0.

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1) These existed in 2014, in particular with regard to the capacity of the owned operations. In case of any structural changes in ownership, such as the acquisition of a new plant, these targets will be reviewed and reformulated considering the new context of the Lenzing Group. Targets and commitments are applicable to the organizational structure and ownership of the Lenzing Group as it.

2) Most relevant suppliers comprise 80 percent of the Lenzing Group’s purchasing spend.

3) This target will allow Lenzing’s stringent internal Group standard to be met at all Lenzing production sites. Baseline for the target is 2014.

4) Specific emissions are defined as emissions per unit of Lenzing Group production (i.e. pulp and fiber production volumes).

5) This target will allow Lenzing’s stringent internal Group standard to be met at all Lenzing production sites. Baseline for the target is 2014.

6) Specific emissions are defined as emissions per unit of production by the Lenzing Group (i.e. pulp and fiber production volumes).

7) Basis 2017
Managing sustainability

**Circularity and waste**

Circularity is a pillar of Lenzing’s sustainability. The company unites the cellulosic fiber cycle of its wood-based products (biological cycle) with its innovative technologies that focus on closing loops and recovery (technical cycles).

The biological cycle starts from the renewable resource, wood, which is converted into dissolving wood pulp and subsequently into fibers. Lenzing’s biorefinery concept stands for 100 percent utilization of the renewable raw material wood. Wood material that is not used for the production of dissolving wood pulp and fibers provides the basis for valuable biobased products and energy. Subsequently, Lenzing’s customers use the fibers in different applications. This biological cycle is closed when the fibers biodegrade or are composted at their end of life.8

In the technical cycle, Lenzing aims to minimize the environmental footprint and to improve resource efficiency by closing the loops of fiber production technologies with state-of-the-art recovery rates. Following the net-benefit principle, Lenzing also considers the downstream value chain steps. Lenzing’s REFIBRA™ technology recycles cellulosic waste from garment-making into dissolving wood pulp and feeds it back into the fiber production, without any loss of quality. With its focus on partnering for systemic change, Lenzing strives to identify and develop cross-industry business cases to make progress on the circularity of Lenzing as well as of the industry.

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8) The compostability and biodegradability of final consumer textile and nonwoven products depend on the material composition (fiber blend) and processing in the value chain steps.
Managing sustainability

Stakeholder dialog

Engaging in a dialog means respecting the stakeholders, contributing with Lenzing’s expertise and knowledge, and the opportunity to learn from the partners’ perspectives. Each dialog starts with providing transparent information. This helps stakeholders to form an educated opinion, to assess risks, and to avoid misunderstandings by building trust. Furthermore, continuous trustful stakeholder relationships contribute to solving existing tensions and avoiding potential conflicts.

Key stakeholder groups

*Canopy and CanopyStyle Initiative*
*Changing Markets Foundation*
*Zero Discharge of Hazardous Chemicals (ZDHC)*
*Textile Exchange*
*Sustainable Apparel Coalition*
*Make Fashion Circular*
*World Resources Institute*
*World Economic Forum*

Main topics discussed in 2018 were:

* Responsible sourcing, in particular sustainable sourcing of wood and pulp
* Responsible fiber production
* Circular economy topics
* CO₂ climate target (science-based target)
* Environmental issues, such as microplastics in the oceans, climate change, waste, emissions, water management
* Transparency and supply chain mapping
* Raw material assessments (definition of sustainable raw materials)
* Life cycle assessment
* Health and safety
* Innovation
* Human rights
* Labor rights
* People and community

To find out more about our stakeholder dialogue, please find all relevant information in the Sustainability Report 2018 on pages 24 and 25.
Wood and dissolving wood pulp certification in the Lenzing Group

Wood and dissolving wood pulp are the most important raw materials for Lenzing. The Lenzing Group assumes responsibility by focusing on sustainable sourcing covered by certifications, responsible consumption, and highly efficient use of these valuable resources.

Lenzing’s wood procurement management system ensures that all wood is sourced from legal and sustainably managed sources. In order to demonstrate that wood sourcing complies with Lenzing’s high standards, the company relies on FSC® and PEFC™ certification systems for verification purposes.

Wood and dissolving wood pulp supply in the Lenzing Group

dissolving wood pulp supply, from own production and market dissolving wood pulp (2016-2018)

<table>
<thead>
<tr>
<th>Wood sourcing region</th>
<th>Central Europe</th>
<th>Europe</th>
<th>South Africa</th>
<th>North America</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wood sourcing countries</td>
<td>see Sustainability Report 2018, page 30</td>
<td>Mainly Scandinavia and Baltic states, Russia</td>
<td>South Africa</td>
<td>USA</td>
</tr>
<tr>
<td>Forest type according to FAO*</td>
<td>Semi-natural forest</td>
<td>Semi-natural forest</td>
<td>Plantation</td>
<td>Semi-natural forest</td>
</tr>
<tr>
<td>Wood species (most important)</td>
<td>Beech, spruce, birch</td>
<td>Birch, aspen, beech</td>
<td>Eucalyptus sp., Acacia sp.</td>
<td>Southern pine, maple, aspen</td>
</tr>
<tr>
<td>Forest certificates</td>
<td>PEFC™, FSC®</td>
<td>PEFC™, FSC®</td>
<td>FSC®</td>
<td>FSC®, PEFC™, SFI</td>
</tr>
<tr>
<td>Verification audit</td>
<td>Rainforest Alliance**</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Wood procurement by

Lenzing Group Wood Procurement

Dissolving wood pulp produced by

Lenzing Group dissolving wood pulp mills (Paskov and Lenzing)

Dissolving wood pulp suppliers**

Sulfite

Sulfite/Kraft

Bleaching process

Totally chlorine free (TCF)

Elemental chlorine free (ECF)

* Carle and Holmgren 2003

More than 99 percent of wood and dissolving wood pulp used by the Lenzing Group is either certified by FSC® and PEFC™ or inspected in line with these standards. Furthermore, the additional CanopyStyle verification audit will be renewed in 2019.
Responsible Sourcing

Certification status in the Lenzing Group
Certification status of total wood input at Lenzing fiber production sites via own and purchased dissolving wood pulp: Left: average 2015-2017, changes less than 3 percent in shares. Right: 2018. Basis: dissolving wood pulp by weight. All PEFC™ certified or controlled sources are also FSC® controlled.
Regional wood supply

In order to ensure short transport distances and short delivery times, almost all the wood required originates either from the country where the pulp is produced or neighboring countries wherever possible.

Wood sourcing for Lenzing Group’s own pulp mills in Lenzing, Austria, and Paskov, Czech Republic

Beech and spruce, by country, average 2015-2017 and 2018. “Other countries” for Lenzing site are Estonia, France, Switzerland, Poland, Romania, Russia, and Ukraine (until mid-2018). “Other countries” for Paskov site are Ukraine and Belarus.

- Other countries
- Slovenia
- Hungary
- Slovakia
- Czech Republic
- Germany
- Austria
- Belarus
- Ukraine
- Poland
- Slovakia
- Czech Republic

Lenzing Pulp Mill

- Average 2015-2017
- 2018

Paskov Pulp Mill

- Average 2015-2017
- 2018
Efficient production

Biorefinery

The Lenzing Group operates two pulp production plants: one at the Lenzing site (Austria) and one in Paskov (Czech Republic). The biorefinery concept ensures that 100 percent of wood constituents are used to produce fibers, biobased chemicals, and bioenergy, thereby maximizing value creation from an economic and environmental perspective.

Highly efficient use of the raw material wood at the Lenzing Group’s biorefineries
Wood and biorefinery products are calculated as “absolute dry”, and pulp as “air-dry”

Energy use and climate change

Furthermore, the Lenzing Group is committed to reducing emissions all along the value chain. Consequently, the company engages with its dissolving wood pulp and chemical suppliers to reduce their CO₂ emissions. Lenzing’s innovative products reduce the footprint of downstream business partners. Table 4/4 on page 42 in the Sustainability report shows in detail how Lenzing is contributing along the value chain.

Sources: World Energy Outlook 2017, Lenzing AG
Includes own energy consumption and energy from providers, excluding grid power which is a minor fraction of total scope 1 and 2 energy consumption in the Lenzing Group. The production sites in Paskov, Grimsby, Mobile, and Heiligenkreuz do not use coal as a fuel source in their own operations, whereas the Asian sites, i.e. Nanjing and Purwakarta, predominantly use coal.
Efficient production

Water use and pollution

Lenzing uses water for processes and cooling purposes and is committed to improving the water-related impacts at its production plants and all along the value chain.

Lenzing’s water stewardship

- Sustainably managed forests which are part of the natural water cycle, ensuring the availability of fresh water
- Certified plantations with efficient water management

Biodegradability*

Compostable and biodegradable in soil and marine environments - no contribution to plastic litter issues

Reduced water consumption and pollution

Substantial reduction of water impacts of final products through blends with LENZING™ fibers

End of use

Careful water use and efficient treatment

Reduced consumption and pollution of water in the dyeing step of the value chain: for example LENZING™ Modal with Eco Color technology (dope-dyed)

Efficient water management

Wood & pulp sourcing

Reduced consumption and pollution of water in the dyeing step of the value chain: for example LENZING™ Modal with Eco Color technology (dope-dyed)

Reduced water footprint

Sustainably managed forests which are part of the natural water cycle, ensuring the availability of fresh water

Certified plantations with efficient water management

* The compostability and biodegradability of final consumer textile and nonwoven products depend on the material composition (fiber blend) and processing in the value chain steps.
Innovation and sustainability are at the heart of Lenzing’s sCore TEN strategy. Every new development, whether it be process-, product-, or application-related, is evaluated from the very beginning in terms of sustainability. Thinking sustainably and paying due regard to both the life-cycle perspective and the net-benefit principle are decisive for innovations at Lenzing. Certain projects and development work focus primarily on sustainability aspects.

The research work focuses on

- developing processes and products hand in hand
- alternative sources of raw material for fiber production
- process innovations to improve efficiency and sustainability
- applications using fibers from Lenzing as a sustainable alternative

Net benefit thinking

Lenzing’s net-benefit products offer positive impacts and benefits to environment, society, and value chain partners, which are better than most competing alternatives in the market. Net-benefit products take a life-cycle perspective and thus include both upstream and downstream value chain processes. Net-benefit thinking describes the performance of Lenzing’s specialities and forward solutions that form part of the sCore TEN strategy. The Naturally positive sustainability strategy is rooted in net-benefit thinking and is the basis for Lenzing’s contribution to the Sustainable Development Goals (SDGs) of the United Nations.

Lenzing Group: Selected fiber types, technologies and branded offers

* complete name: Lenzing™ Modal with Eco Soft technology
Responsibility for People

Employees

The corporate culture of the Lenzing Group is characterized by long-term partnerships, trustful collaboration, and mutual respect founded on open dialog and transparency. The principles of sustainability as a company value have been integrated into the global human resources (HR) strategy, Lenzing’s HR policy and HR-related processes.

Diversity: information by country, 2018
(headcount, proportion of women, proportion of over-50s, employee turnover rate)

<table>
<thead>
<tr>
<th>Country</th>
<th>Headcounts*</th>
<th>Female in %</th>
<th>Age &gt; 50 in %</th>
<th>Turnover in %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Group</td>
<td>6,657</td>
<td>13.9</td>
<td>22.9</td>
<td>5.4</td>
</tr>
<tr>
<td>Austria</td>
<td>3,216</td>
<td>16.8</td>
<td>27.2</td>
<td>5.1</td>
</tr>
<tr>
<td>Indonesia</td>
<td>1,763</td>
<td>3.6</td>
<td>12.8</td>
<td>3.3</td>
</tr>
<tr>
<td>China</td>
<td>823</td>
<td>19.4</td>
<td>5.2</td>
<td>9.6</td>
</tr>
<tr>
<td>Czech Republic</td>
<td>406</td>
<td>17.7</td>
<td>49.0</td>
<td>7.2</td>
</tr>
<tr>
<td>USA</td>
<td>205</td>
<td>17.6</td>
<td>42.4</td>
<td>9.9</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>179</td>
<td>12.3</td>
<td>49.7</td>
<td>1.5</td>
</tr>
<tr>
<td>Other**</td>
<td>65</td>
<td>44.6</td>
<td>10.8</td>
<td>12.5</td>
</tr>
</tbody>
</table>

* Employees excluding apprentices and contractors
** India, Thailand, Turkey, Korea, Singapore, and Brazil

Find more on the growing workforce, diversity, works council and lifelong learning and training in our Sustainability Report, starting on page 56.

Safety

Lenzing’s Group philosophy for safety, health, and the environment (SHE) aspires to no accidents, no harm to people, and no damage to the environment, underpinned by its vision LEAVE HOME HEALTHY, COME HOME HEALTHY. Lenzing identifies potential hazards and risks at every stage of its production processes. Lenzing designs facilities and implements plant and process changes according to appropriate industry standards. Further details regarding Lenzing’s SHE policies are available on the Lenzing website https://www.lenzing.com/en/sustainability/people/health-and-safety/.

Improving Safety, Health, and Environment in Lenzing operations is a high priority and the teams are continuously investigating safety incidents and near misses to identify any potential underlying issues. Leading indicators are used to monitor the strength of controls to prevent incidents.
The United Nations SDGs

The Lenzing Group “Naturally positive” sustainability strategy supports the following SDGs:

- **SDG 7**: Affordable and clean energy
- **SDG 9**: Industry, innovation and infrastructure
- **SDG 12**: Responsible consumption and production
- **SDG 13**: Climate change
- **SDG 15**: Life on land
- **SDG 17**: Partnerships for the goals

Further goals for the Lenzing Group are:

- **SDG 1**: No poverty
- **SDG 3**: Good health and wellbeing for people
- **SDG 6**: Clean water and sanitation
- **SDG 8**: Decent work and economic growth
- **SDG 14**: Life below water

You can find more information on this topic on page 53 in the Sustainability Report.

Links

Sustainability Report 2018

Sustainability Report 2017

Lenzing Group’s Materiality analysis

Annual Report 2018
https://www.lenzing.com/fileadmin/content/PDF/07_Finanzen/Geschaftsberichte/EN/GB_2018_EN.pdf

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