



Schafer, Achim 19.10.2015

---

## 2015 Market Statement for Switzerland Developments in Forest Product Markets

---

Reference: O431-1429



## Contents

<b>COFFI Swiss Market Statement 2015 .....</b>	<b>Error! Bookmark not defined.</b>
<b>1 General economic trends .....</b>	<b>3</b>
<b>2 Developments in forest products markets .....</b>	<b>3</b>
<b>2.1 Overview and general trends .....</b>	<b>3</b>
<b>2.2 Excellence in Swiss timber construction .....</b>	<b>4</b>
2.2.1 Timber construction in Switzerland – example 1: House of Natural Resources of the ETH at Zurich .....	5
2.2.2 Timber construction in Switzerland – example 2: Wiessenstein Cableway Station Buildings .....	7
2.2.3 Timber construction in Switzerland – example 3: Headquarters of the Swatch Group, Biel .....	9
<b>3 Roundwood: sawlogs, pulpwood and fuelwood.....</b>	<b>11</b>
<b>3.1 Developments up to mid-2015 .....</b>	<b>11</b>
<b>3.2 Timber assortments and price trends .....</b>	<b>11</b>
<b>3.3 Economic situation of the forestry sector .....</b>	<b>12</b>
<b>3.4 Wood energy .....</b>	<b>13</b>
<b>3.5 Certified forest and forest products .....</b>	<b>14</b>
3.5.1 FSC and PEFC certification .....	14
3.5.2 "Herkunftszeichen Schweizer Holz" (label of origin) .....	14
<b>3.6 Sawnwood.....</b>	<b>14</b>
<b>3.7 Pulpwood-processing sector .....</b>	<b>16</b>
3.7.1 Wood-based panels .....	16
3.7.2 Pulp and paper .....	16
<b>4 Tables .....</b>	<b>17</b>
<b>4.1 Economic Indicators for Switzerland .....</b>	<b>17</b>
<b>4.2 Forest products production and trade in 2012–2013; Estimations and Forecasts for         2014–2015.....</b>	<b>18</b>

Contributions: Eduard Belser, Journalist specialising in the timber market

Compiled by: Achim Schafer, Swiss Federal Office for the Environment FOEN, Forest Division, Bern

Source cover image: see page 7

# 1 General economic trends

## Developments up to mid-2015

For the reporting period 2014 to mid-2015 the Swiss export economy continued to be overshadowed by the difficult economic situation in key euro countries and the associated weakness of the euro in relation to the Swiss franc. This situation was severely exacerbated by the withdrawal of the temporary emergency support for the euro by the Swiss National Bank on 15 January 2015. The value of the euro fell and reached a mean monthly exchange rate of just 1.0382 CHF/EUR in April. The debate surrounding the crisis in Greece and its possible exit from the Eurozone was a contributory factor. The euro exchange rate recovered somewhat from August 2015 but remained slightly below the 1.100 CHF/EUR threshold. To reduce the attractiveness of the Swiss franc somewhat, negative interest rates were imposed on large credit balances. However, the investors affected by this measure include major domestic investors, for example pension funds.

The actors negatively affected by this development included, not least, the already weakened forestry sector and parts of the timber sector. Sawmills and the manufacturers of wood-based materials, paper and paperboard, whose products came under increased price pressure on the domestic and export markets, were particularly severely affected. The very survival of companies in some sectors was under threat, for example operations in the catering and tourism sector and other sectors, whose costs are generated at domestic level in Swiss francs and cannot be counterbalanced by the purchase of cheaper raw materials or preliminary inputs from the euro zone. The pharmaceuticals/chemicals industry and the watches and jewellery sector proved to be more resistant. Households benefited from the cheaper imports and from resulting price reductions by domestic suppliers, however they were unsettled by the gloomier economic forecasts and concerns about jobs. Shopping tourism abroad has a negative impact on the retail trade in border regions in particular.

## Outlook

Switzerland's economic development will continue to be influenced by the general climate of the low euro exchange rate for the rest of 2015 and in 2016. One factor that is driving uncertainty is the decline in China's GDP growth and the associated impacts on the other Asian markets.

These negative factors could be alleviated by positive economic development in Switzerland's main trading partner Germany and a stable or even stronger US dollar. The extent to which the significantly reduced oil prices will have a rejuvenating impact on the Euro zone remains open. It is still difficult to estimate the negative effects arising from the reduced purchasing power of the oil-exporting countries, which include Norway.

Experts expect a clear decline in GDP growth for 2015 but predict a degree of recovery in 2016. The contrasting situation between good domestic demand and subdued foreign trade is expected to continue. The strong inflation in the European region compared to Switzerland should alleviate the impact of the low euro exchange rate.

-> For more information, see: <http://www.seco.admin.ch/aktuell/00277/01164/01980/index.html?lang=en&msg-id=53366>

# 2 Developments in forest products markets

## 2.1 Overview and general trends

In the Swiss forestry and timber sector, the years 2014 to mid-2015 continued to be marked by the weakening of the euro. This was further exacerbated by the decision of the Swiss National Bank of mid-January 2015. However, the adjustment in the exchange rate has had obvious effects on the trade in timber products, which is strongly integrated into the global market. Approximately 95% of Swiss exports of timber products are exported to the EU or imported from the EU. The derived timber products and base paper industries, in particular, export a high proportion of their production into the EU. Due to the relative rise in the cost of their products, these industries are losing competitiveness. As Chapter 1 shows, Switzerland's economic development suffered a significant setback in 2015. The fact that this overall picture conceals an economy of two parts is demonstrated by the situation in the different branches of the forestry and timber sector:

- The strong construction sector and the increasing popularity of timber as an ecological construction material ensured a stable demand for timber and meant that wood-processing operations in some regions are working at a good capacity.
- The stimulating domestic demand was counteracted, however, by the restraining effect of the strong Swiss franc. While the timber builders could benefit from the cheaper imports of semi-finished wood products, the margins and profits of domestic wood traders, sawmills and exporters came under pressure from the exchange rate.

## Outlook

The turning point marked by the jump in the franc/euro exchange rate of early 2015 will definitely have a distorting effect on Switzerland's economic development until 2016. The following factors continue to apply, however:

- The long-term buoyancy in construction, in particular residential construction, will shore up the demand for soft sawlogs.
- The high valuation of the Swiss franc against the euro will continue to generate strong pressure on imports and impacts on domestic prices in Swiss francs.
- The demand for hard sawlogs will remain weak; and the market for energy wood will grow. Two large new wood-fired heating plants of regional significance are planned.
- Demand for industrial wood may be expected to remain constant; here too the market is significantly influenced by the CHF/EUR exchange rate and part of the demand should be covered by imported wood. It is interesting to note, however, that Switzerland's only remaining manufacturer of particleboard intends to invest CHF 80 million in a new production plant at its Swiss headquarters by 2017.

## 2.2 Excellence in Swiss timber construction

In the residential construction sector, new building and extensions and property remodelling continue to operate at a high level. Timber construction is also gaining ground in multi-story construction and in industrial-commercial building. Capacities in the areas of timber construction, carpentry and interior construction are correspondingly well utilised. The investments made in research on timber construction and in the training of timber construction engineers and timber builders are bearing fruit. New timber construction standards and fire safety regulations that take the current status of timber construction into account are also contributing to this development. These new fire regulations entered into force on 1 January 2015 and have liberated timber construction from certain restrictive conditions, particularly in relation to multi-storey and high-rise residential buildings. This means that it is now possible to use timber construction for many buildings, for which this was not previously possible. Residential, office, school, industrial and commercial buildings, tourist accommodation and retail outlets up to a total height of 30 m can now be constructed in timber. The use of structural timber components and timber components that form fire compartments, which contain combustible elements, is now admissible under certain conditions, even in high-rise buildings.

The new timber construction solutions developed by Swiss timber builders are setting global trends for modern and energy-efficient construction based on the CO<sub>2</sub>-neutral construction material wood. Timber is being rediscovered as a construction material by clients and architects and also, increasingly, for buildings in the tourism and transport sectors. The shorter construction periods and the possibilities for the prefabrication of large components, which are can be assembled and installed quickly on the building site, also play an important role in this development. Some pioneering projects were completed in 2014 and 2015, others are still under construction. Some flagship projects and smaller but exemplary timber buildings are presented below.

However, this success has not benefited Swiss forest owners and sawmills to the extent that was hoped for. The timber builders and clients earn their profits in Swiss francs for the most part. At the same time, they can purchase sawn timber, semi-finished wood products and, above all, glued construction timber, derived timber products, and other additional supplies in the euro zone and reduce their costs in this way. As a result, considerable volumes of glued construction timber are being imported, mainly from Austria and Germany. In the case of Austria, in particular, some of this glued construction timber is produced from exported Swiss roundwood.

### 2.2.1 Timber construction in Switzerland – example 1: House of Natural Resources of the ETH at Zurich

- Building completed: 2015
- Client: ETH Zurich Department of Civil, Environmental and Geomatic Engineering
- Architecture: ETH Zurich Department of Civil, Environmental and Geomatic Engineering
- Timber construction: various Swiss timber construction companies
- Number of floors: 3 (2 in timber)

Special features: The House of Natural Resources (HoNR) is a flagship project for a hardwood building. It is an exciting development for researchers at ETH Zurich as the building will serve as a research laboratory for sustainable construction. Office buildings rarely cause a stir, but the HoNR is quite different: a simple frame construction makes it possible to customise the floor plan as desired through the arrangement of the inner and outer walls. Transparent façades and a jointless outer shell also create a pleasant working environment. Furthermore, the HoNR is more than just an innovative office building; it will also serve as ETH Zurich's research laboratory for sustainable construction using hardwood. Six professors from the Institutes of Structural Engineering, Building Materials, and Technology in Architecture and their research groups were involved in the construction of the building, in which they implemented findings directly from their research projects. ETH President Lino Guzzella says of this unique new building: "The House of Natural Resources is a good example of on-site interdisciplinarity. It shows how wood, an indigenous raw material, can be used in a sustainable and technically smart way." The structural frame of the HoNR is made of Swiss wood: the columns are constructed entirely in ash and the beams made of a combination of ash and spruce to increase their strength. In addition, all of the beams are post-tensioned with a cable running through the inside of the wood. As a result, they centre themselves. This makes the entire structural frame particularly flexible and very earthquake-resistant (ETH Zurich).

- ➔ Award: Schweighofer Prize, European Innovation Award for Forestry, Wood Technology and Timber Products 2015.



*Fig. 1* The House of Natural Resources on the ETH Zurich's Höggerberg campus may appear small and unremarkable from outside, however it contains numerous innovative and pioneering wood-based features.

*(Image source: ETH Zurich / Marco Carocari)*





*Fig. 2* The beech slab with its crossing beechwood lamellas is the first of its kind in the world.  
(Image source: *Eduard J. Belser*)



*Fig. 3* Using a variety of sensors, the monitoring system, which is installed on the columns and beams, monitors and records the behaviour of the wood components of the post-tensioned glued-laminated hardwood timber frame.  
(Image source: *Eduard J. Belser*)

## 2.2.2 Timber construction in Switzerland – example 2: Weissenstein Cableway Station Buildings

- Buildings completed: 2015
- Client: Seilbahn Weissenstein AG
- Architecture: Guido Kummer + Partner Architekten, Solothurn
- Timber construction: neue Holzbau AG, Lungern
- Volume: Tallest building 18.25m (middle station), widest building 38.25m (valley station), lengths: mountain station 24.0m, middle station 30.5 m, valley station 34.5 m; total floor space of the three stations: 2,814 m<sup>2</sup>
- Volumes of timber used: External cladding in silver fir 3000 m<sup>2</sup>, 74 timber rafters, construction timber 300m<sup>3</sup> = ca. 1,000 trees
- Construction period and milestones: 25 February 2014 commencement of excavations for valley station; 06 June 2014 installation of foundations for middle station; 28 August - 04 September 2014 assembly of girders for the mountain station; 18 December 2014 completion of interior work; 20 December 2014 opening of the cableway

*Cover image* – Weissenstein cableway mountain station at night  
(Image source : Marco Faggi, Wiler bei Utzenstorf)



*Fig. 4* – Weissenstein Cableway valley station  
(Image source: Guido Kummer + Partner Architekten, Solothurn)





*Fig. 5* – Weissenstein Cableway middle station  
(Image source: Guido Kummer + Partner Architekten, Solothurn)



*Fig. 6* – Weissenstein Cableway mountain station  
(Image source: Guido Kummer + Partner Architekten, Solothurn)



### 2.2.3 Timber construction in Switzerland – example 3: Headquarters of the Swatch Group, Biel

- Start of construction: 2014
- Client: Swatch Group: Swatch Group, Biel-Bienne
- Architecture: Shigeru Ban, Tokyo/Paris
- Timber construction: Blumer-Lehmann AG, Gossau
- Timber used: Swiss spruce, Swiss copper beech

Special features: at a planned total construction cost of around CHF 150 million, this is the biggest timber construction project to be carried out in Switzerland up to now. The biggest challenge that the Swatch Group headquarters poses for the designers is the spherical timber net structure which is intended to envelop the building. There will be no level surfaces on the roof. It is intended to use the roof and façade surfaces for energy gain.

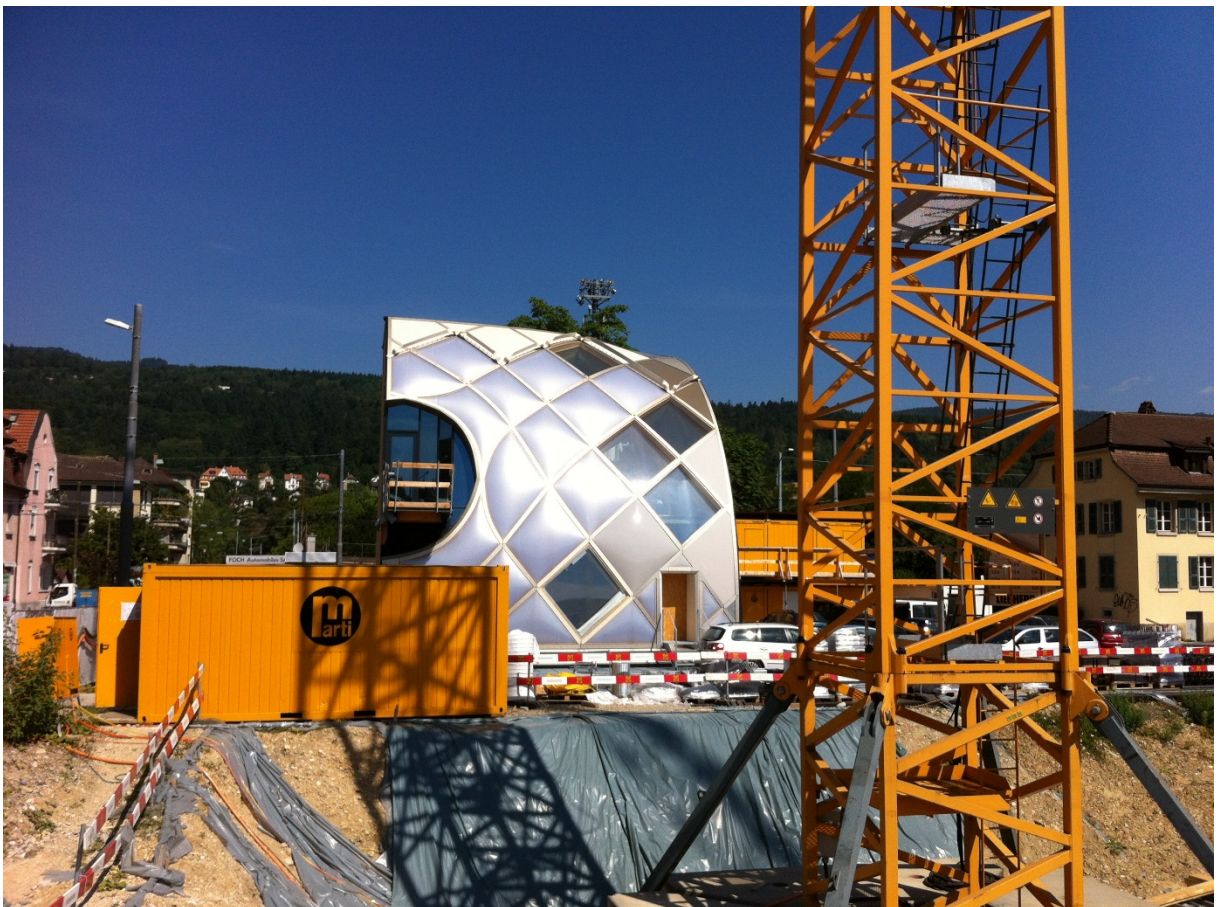


*Fig. 7* – Left: serpentine semi-circular Swatch headquarters; centre: covered plaza; right: main building with conference rooms and Swatch and Omega museums  
(Image source: Shigeru Ban, Tokyo/Paris)





*Fig. 8* – The shell of the Omega manufacturing building with partly cladded façade.  
(Image source: Eduard J. Belser, Egerkingen)



*Fig. 9* – Model of the serpentine semi-circular section of the Swatch headquarters, which is being used as the site office.  
(Image source: Eduard J. Belser, Egerkingen)

### 3 Roundwood: sawlogs, pulpwood and fuelwood

#### 3.1 Developments up to mid-2015

The Swiss forestry sector was spared the effects of major storms and compulsory logging from 2008 to mid-2015. The volumes of bark-beetle wood, which had remained high in 2007, also declined significantly and reached their lowest level for years in 2013, however, they rose again in 2014 and 2015.

A total of 4.9 million cubic metres (m<sup>3</sup>) of wood was logged in Switzerland in 2014, around 3% more than in the previous year. This increase can be explained by the growing demand for wood energy. Wood harvesting was still below the average value for the past 20 years. 66% of the wood harvest, i.e. 3.2 million m<sup>3</sup>, originated from public forests and 1.6 million m<sup>3</sup> from private forests.

The harvesting of softwood increased by 3% to 3.18 million m<sup>3</sup> and hardwood harvesting increased by 3.1% to 1.74 million m<sup>3</sup>. The proportion of harvested wood accounted for by softwood has decreased from 76% in 2005 to 65% in 2014, and the proportion of hardwood has increased from 24% to 35%. This reflects the trends in natural forest development: two thirds of the standing volume is softwood and declining, while one third is hardwood and increasing.

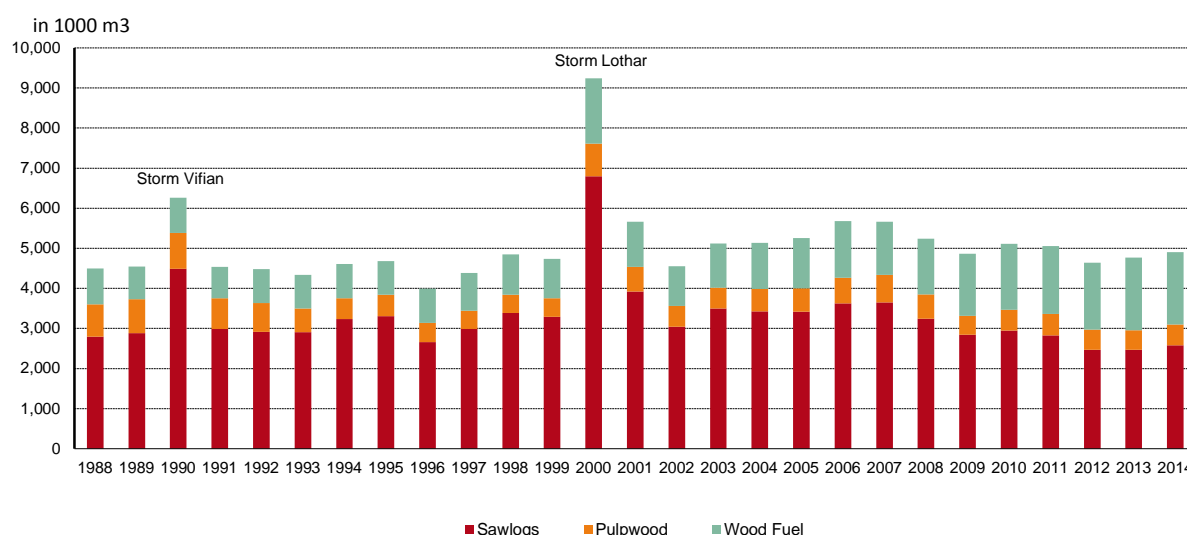


Fig. 7 – Wood harvest in Switzerland 1987 – 2014

#### 3.2 Timber assortments and price trends

Of the 2.58 million m<sup>3</sup> of sawlogs harvested in 2014, 2.33 million m<sup>3</sup> or 90% were softwood and only 10% hardwood. The market for soft sawlogs in 2014 and 2015 was influenced by the pressure arising from the low euro exchange rate: due to the changes in the exchange rate, the forestry sector had to accept price reductions to be able to sell the timber abroad and on the domestic market. Another negative impact arose from the construction sector in Italy, which is an important market for sawlogs and sawnwood exports and experienced its worst crisis since the Second World War in 2014/2015. To this was added the negative effect of cyclone Niklas on the demand from Austria for sawlogs.

Soft sawlog prices came under pressure in 2014/2015. The average price for spruce/fir sawlogs fell by 12.8 % from May/June 2014 to May/June 2015 and considerably less wood was sold.

Exports of soft sawlogs decreased by 3% to 500,000 m<sup>3</sup>. Imports decreased by 13% to 48,000 m<sup>3</sup>. The market for beech sawlogs, the most important variety of hardwood in terms of volume, remains weak due to the lack of suitable processors. The majority of the traditional processing capacities for Swiss beechwood in northern Italy ceased operation in recent years. The price of beech sawlogs remained under pressure during this reporting period.

The harvesting of hard sawlogs increased in 2014 by 20% to approximately 251,000 m<sup>3</sup>, of which 175,000 m<sup>3</sup> was exported. At around 40,000 m<sup>3</sup> in 2014, imports of hard stemwood were also considerably lower than exports.



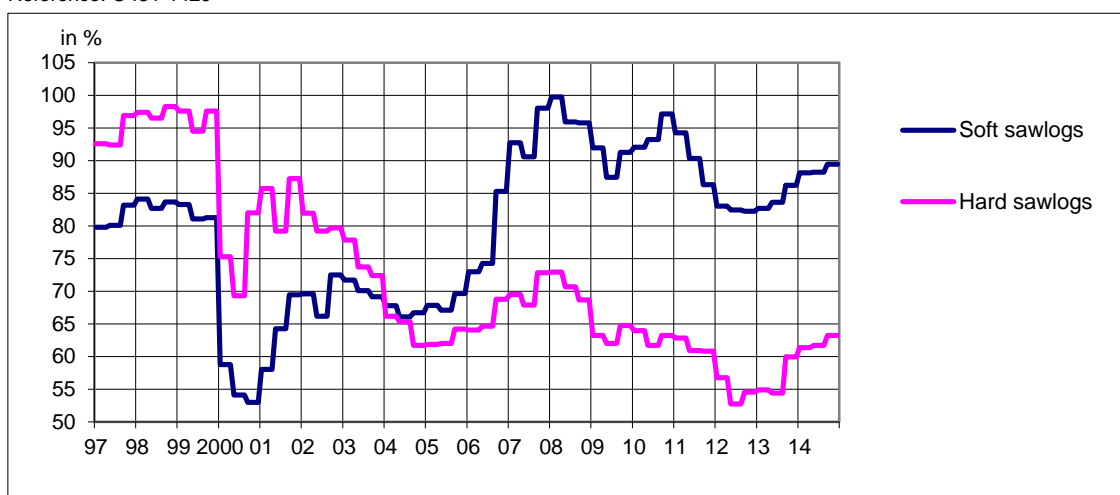


Fig. 8 – Price index for sawlogs, 1997-2014 (Sep-Dec 1992 = 100)

(Source: Federal Office for Statistics)

The harvesting of energy wood decreased slightly by 0.6% to 1.80 million m<sup>3</sup> and that of wood for the derived wood products and paper industries (“industrial wood”) increased by 8,0% to 0.54 million m<sup>3</sup>. Hence the supply of wood shifted further away from higher quality roundwood assortments to lower quality assortments for industrial processing and, above all, energy production. Medium and lower quality beech roundwood, large volumes of which were exported to Italy or processed in Switzerland into the 1990s, now enter the expanding energy wood market.

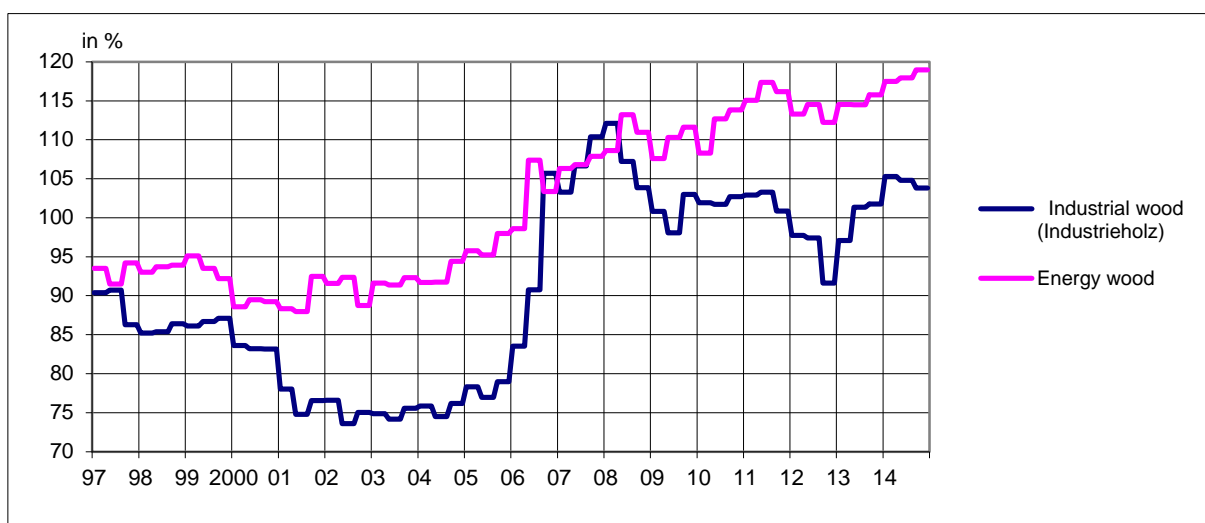


Fig. 9 – Price index for industrial wood (pulp wood) and for energy wood, 1997-2014 (Sep-Dec 1992 = 100)

(Source: Federal Office for Statistics)

### 3.3 Economic situation of the forestry sector

Public forestry operations manage 71% of Switzerland's productive forest area. The difficult economic environment also affected the economic situation of the forestry operations. Following a considerable decline in the previous year, their economic losses increased again in 2014 by 16.6% to around CHF 50 million. Their main operations, which include, inter alia, the wood harvest and wood sales, suffered losses of CHF 58 million in 2014. This represents a 12.7% increase on the losses in the previous year. This corresponds to a loss of a good CHF 10 per harvested cubic metre of wood for Swiss forest owners. In terms of ancillary activities, which include services to third parties, profits declined by 6.8% to just under CHF 8 million. When the cost of forest maintenance, forest access, welfare services,

infrastructure and administration is taken into account, the uncovered cost of the harvesting of a cubic metre of wood is CHF 12. The cost of wood harvesting and mountain and protective forest maintenance cannot be met without state subsidies.

-> see also: <http://www.bafu.admin.ch/wald/01256/12717/index.html?lang=fr&msg-id=53800>

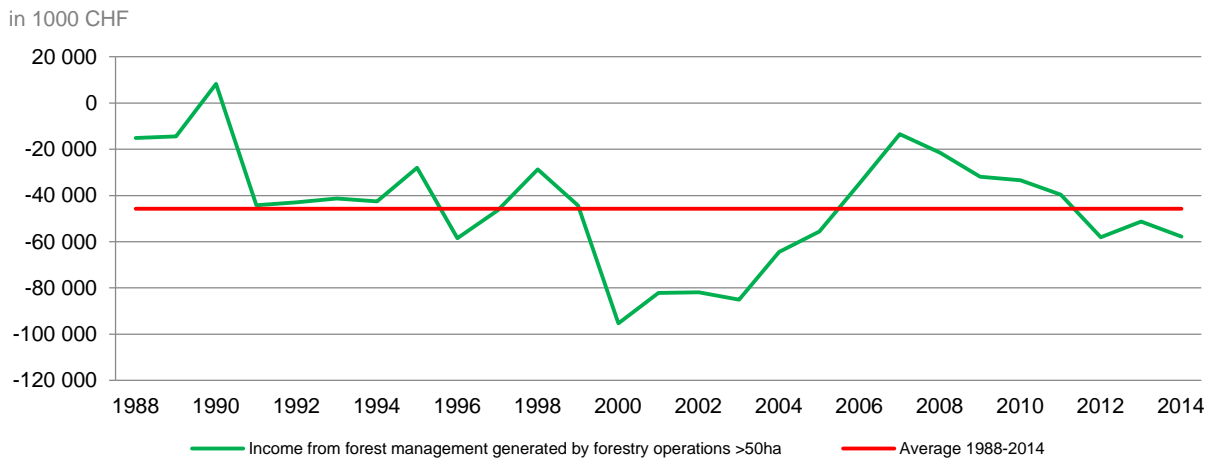


Fig. 10 – Comprehensive income from forest management by Swiss forestry operations, 1988-2014

(Source: Federal Office for Statistics)

### 3.4 Wood energy

In 2014, Switzerland's final energy consumption declined by 7.7% to 825,770 TJ compared to the preceding year. The warm weather conditions in 2014 had a clear impact on Swiss final energy consumption. In contrast, the factors that will determine the long-term growth trend of energy consumption grew: i.e. the permanent residential population by 1.2 %, gross domestic product by 2.0 %, housing stock (increase, detailed figures not yet available), motor vehicle stock by 1.6 %. 4.2% (34,500 TJ) of the energy required was generated from wood. Due to weather conditions, this is also lower than in 2013.

Due to the characteristics of this climate-neutral raw material and the subsidising of non-renewable energies, the importance of wood as an energy source continues to increase. The potential offered by energy wood (i.e. forest, slash, wood residues and used wood) will be exploited more extensively in the future. The cost-covering remuneration for feed-in to the electricity grid (CRF) for electricity generated from renewable sources affects the viability of wood-fired heating plants and, together with a desired gain in terms of image, increases the (economic) attractiveness of business with green electricity for the Swiss electricity companies.

Four large wood-fired power plants currently operate in Switzerland. Two new large wood-fired power plants, one in Basel itself and the other in the Basel region, are currently being planned. The Basel plant, which will be built from 2016 and is expected to commence operation in 2018, will provide 80 gigawatt hours of thermal energy and 27 gigawatt hours of electrical energy annually. This wood-fired power plant will enable the avoidance of 19,000 tonnes of CO<sub>2</sub> emissions from fossil fuels annually. The plant in the Basel region is intended to replace an existing heating-oil and gas-fired power plant. This will enable an annual reduction in CO<sub>2</sub> emissions of 48,000 tonnes. This plant is expected to generate 221 gigawatt hours of thermal energy and 48 gigawatt hours of electrical energy annually. The generated thermal energy will be used primarily as process heat in a neighbouring industrial area. Small to medium-sized wood-fired heating systems of local and regional importance are also being installed on a regular basis.

Foreign trade in fuelwood is relatively insignificant. In other words, the fuelwood harvested in Switzerland is also burned within the country.

### 3.5 Certified forest and forest products

#### 3.5.1 FSC and PEFC certification

Approximately 0.65 million ha of Swiss forest (i.e. 51 % of the total forest area) was certified in 2014. Of these certified areas, more than the half have both FSC and PEFC certification. Of the timber harvested in Switzerland in 2014, 66% was certified.

At present, over 900 companies operating at all levels in the timber processing sector hold a certificate. In contrast to the situation in the forestry sector, the majority of these companies, only hold the FSC certificate. Thus, the Swiss wholesale distributors, which also hold a significant share of the market in the DIY sector, are FSC-certified. 30% hold both the FSC and PEFC certificate. At present there are no companies in Switzerland that are solely PEFC-certified.

In 2009 a national certification standard, which forms the basis of certification for FSC and PEFC in Switzerland, was introduced by both label organisations. However, this harmonisation is criticised today as the competition between the private labels is disappearing as a result of its introduction. The main driving forces for certification in Switzerland are the DIY sector and the demand for certified paper products. However, the sellers of certified wood cannot demand a higher price ("green premium"). Thus the market does not compensate for the additional costs incurred in certification. For this reason, certification is a contentious issue in the forestry and timber sector.

#### 3.5.2 "Herkunftszeichen Schweizer Holz" (label of origin)

The origin of the wood is not declared under the FSC and PEFC certification systems. In 2009 the forestry and timber industry introduced a new label ("Herkunftszeichen Schweizer Holz", HSH). It is managed by LIGNUM, the Swiss timber sector umbrella organization. Its main purpose is to show and prove the Swiss origin of the timber products. The intention here is to raise the awareness of end users about Swiss wood that is produced in accordance with the strict sustainability requirements of the Swiss forest legislation and has not caused environmental pollution as a result of being transported over long distances.

The HSH guarantees the traceability and documentation of a wood product from its origin to the end user. Products bearing the Herkunftszeichen Schweizer Holz label of origin may contain up to 20% of wood of foreign origin if it comes from a comparable production region (low risk origin) and has a sustainability certificate or declaration of origin.

Since September 2011, all wood origination from Swiss forest areas can be marked with the Herkunftszeichen Schweizer Holz label of origin. Use rights are assigned to forest owners if they are prepared to fulfil the conditions of the regulation. The cantonal forestry sector associations monitor compliance with the regulation requirements.

-> [http://www.lignum.ch/fr/technique/certification\\_du\\_bois/](http://www.lignum.ch/fr/technique/certification_du_bois/); <http://www.wvs.ch/fr/taches-centrales/dossiers/certificat-dorigine-bois-suisse.html>

### 3.6 Sawnwood

In 2014, Swiss sawmills only processed 1.87 million m<sup>3</sup> of soft sawlogs, compared to 1.75 million m<sup>3</sup> in 2013, 1.86 million in 2012 and 2.07 million in 2011.

The volume of soft sawn timber produced in 2014 was 1.07 million m<sup>3</sup>. Imports of soft sawlogs declined by 2.2% to 362,000 m<sup>3</sup> in 2014 and exports increased by 1.7% to 180,000 m<sup>3</sup>.

Whereas 35% of the wood that was harvested in 2014 in the Swiss forest was hardwood, only 6% of the wood cut in the sawmills is hardwood. This can be explained by the fact that the construction sector mainly uses softwood. Hence demand is not quite in tune with the natural wood supply of the Swiss forest. This is problematic from an environmental economics perspective as cascade use<sup>1</sup> is politically and socially desirable.

---

<sup>1</sup> Cascade use refers to the principle whereby particularly high quality wood is used first for long-lasting products and is only made available for energy use at the end of the lifecycle of these products.



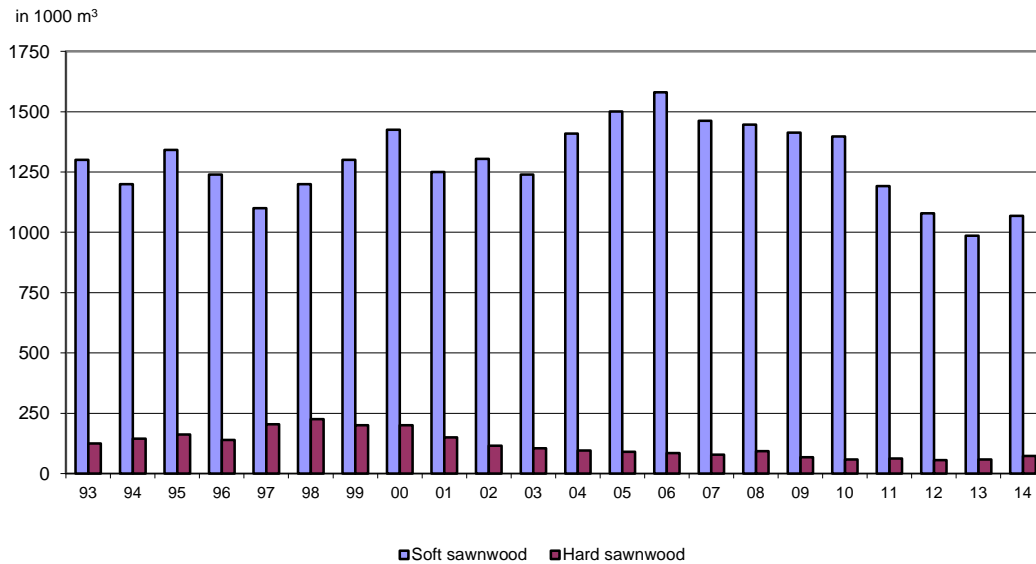


Fig. 11 – Sawnwood production in Switzerland, 1993-2014

(Source: Federal Office for Statistics)

Swiss sawmills largely cover their sawlog requirements from domestic sources – at prices charged in Swiss francs. They also export sawnwood and sawnwood residues into the euro zone. As a result they face a double, and correspondingly severe, competitive disadvantage vis-à-vis their competitors from the EU. Moreover, the Italian sawnwood market, a traditional sales channel, is declining, and, on the domestic market, traditional wood boards cut to the customer’s specifications for construction purposes, are being increasingly replaced by further processed semi-finished products such as glued construction timber. The prices of imported glued-laminated beams correspond approximately to those that Swiss laminated wood producers have to pay for domestic sawnwood.

Given that the increase in the average prices of the sawnwood assortments was lower than those of sawn roundwood, the economic scope available to the sawmills decreased further.



Fig. 12 – Price index for soft sawnwood, 1997-2014 (Sep-Dec 1992 = 100)

(Source: Federal Office for Statistics)

In 2014, Swiss sawmills generated 729,000 m<sup>3</sup> of sawnwood residues, of which 18% were used to generate energy within the operations themselves and 19% by third parties; 50% went to the paper and wood-based panel industries and 13% was used in other ways as raw materials.

### **3.7 Pulpwood-processing sector**

In 2014, 535,000 m<sup>3</sup> of industrial wood was harvested, of which 52% was softwood. 83,000 m<sup>3</sup> of industrial wood was imported and 82,000 m<sup>3</sup> exported, giving a domestic consumption of industrial wood of 518,000 m<sup>3</sup> for 2014. The volume of wood chips, particles and residues consumed in addition to this industrial wood is calculated at 1.19 million m<sup>3</sup>.

Imports of industrial roundwood are subject to major fluctuations as the internationally oriented industrial wood processors take greater account of the prevailing supply situation and currency developments than the sawmills when purchasing raw wood.

#### **3.7.1 Wood-based panels**

The production of wood-based panels in Switzerland is shared by only two companies, one of which produces particleboard and the other various forms of fibreboard. Since early 2010, export figures are no longer published for data protection reasons and have to be estimated.

2014 was again a mixed year for the Swiss particle board and fibreboard industry. It benefited from the strong construction economy and from energy-based building renovation but is under pressure in the export sector. Particleboard production in 2014 was estimated at around 0.38 million m<sup>3</sup> while that of fibreboard was estimated at 0.54 million m<sup>3</sup>. Soft fibreboard is preferred for the energy-based renovation of buildings and used for high-quality heat and noise insulation. Particleboard is mainly used in the production of furniture and in interior construction. Hard fibreboard is not produced in Switzerland.

#### **3.7.2 Pulp and paper**

Although the restructuring process in the European paper industry had further impacts on Switzerland in 2014/2015. Another plant ceased paper production in early 2015. Raw material and energy prices, excess production capacity and currency difficulties remained the main challenges facing the sector in 2014. At 1.26 million tonnes, the 11 remaining plants produced 2014 more paper and paperboard than in 2013 (1.22 million tonnes).

Paper and paperboard consumption in 2014 was 1.30 million tonnes or 157 kg per capita; the corresponding figure for 2013 was 1.33 million tonnes/164 kg per capita.

In 2014, 0.93 million tonnes of paper and paperboard were imported and 0.89 million tonnes or 69% of Swiss production were exported. Switzerland's main trading partner for paper and paperboard is Germany. In 2014, 38% of imports originated from there and 36% of exports were sent there. With a market share of 23%, Italy is the second most important consumer of paper and paperboard from Switzerland. At 8%, Italy's contribution to imports is considerably lower. Over 99% of Swiss paper and paperboard imports originate from Europe and almost 98% of exports go to Europe. This illustrates the central significance of economic development in Europe and the euro/Swiss franc exchange rate for this sector.

The paper producers import their entire cellulose requirements as cellulose is no longer produced in Switzerland since 2008.

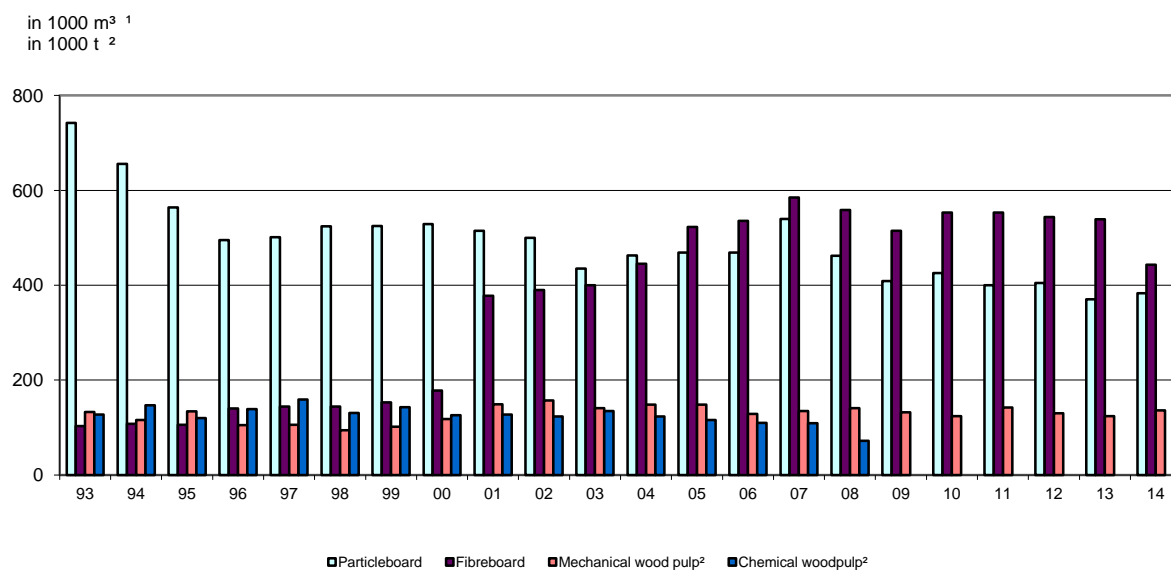


Fig. 13– Production of wood panels and wood pulp 1993-2014

(Source: Estimated values; Federal Office for the Environment FOEN, Forest Division)

## 4 Tables

### 4.1 Economic Indicators for Switzerland

#### Economic Indicators for Switzerland

	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014 <sup>F</sup>	2015 <sup>F</sup>	2016 <sup>F</sup>
<b>Economic growth in %<sup>1</sup></b>	0	2.4	2.7	3.8	3.8	2.2	-1.9	3	1.8	1	2	2.1	0.8	1.2
<b>Inflation in %<sup>2</sup></b>	0.6	0.8	1.2	1.1	0.7	2.4	-0.5	0.7	0.2	-0.7	-0.2	0	0.2	0.3
<b>Unemployment rate in %<sup>3</sup></b>	3.7	3.9	3.8	3.3	2.8	2.6	3.7	3.5	2.8	2.9	3.2	3	3.3	3.5
<b>Interest yields in 10-year government bond in %<sup>4</sup></b>	2.6	2.7	2.1	2.5	2.9	2.9	2.2	1.6	1.5	0.7	0.9	0.8	0.7	0.2
<b>Currency rate<sup>4</sup></b>														
EUR	1.52	1.54	1.55	1.57	1.64	1.59	1.51	1.38	1.23	1.21	1.23	1.2	1	1.1
USD	1.35	1.24	1.25	1.25	1.2	1.08	1.09	1.04	0.89	0.94	0.93	0.9	0.9	0.9

1) State Secretariat for Economic Affairs SECO, revised 2012 in accordance with NOGA 2008 (Nomenclature Générale des Activités économiques), statistical series retrospectively revised


2) Consumer Price Index, Swiss Federal Statistical Office BFS


3) State Secretariat for Economic Affairs SECO

4) Swiss National Bank SNB



## 4.2 Forest products production and trade in 2012–2013; Estimations and Forecasts for 2014–2015

Product Code		Product	Unit	Historical data		Estimate	Forecast
				2013	2014	2015	2016
				Country: Switzerland		Date: 19.10.2015	
				 <b>UNECE TIMBER FORECAST QUESTIONNAIRE</b> <b>Roundwood</b>			
1.2.1.C	SAWLOGS AND VENEER LOGS, CONIFEROUS						
	Removals	1000 m <sup>3</sup>	2'262	2'327	2'350	2'400	
	Imports	1000 m <sup>3</sup>	55 #	48 #	40	35	
	Exports	1000 m <sup>3</sup>	512 #	500 #	480	460	
	Apparent consumption	1000 m <sup>3</sup>	1'805	1'875	1'910	1'975	
1.2.1.NC	SAWLOGS AND VENEER LOGS, NON-CONIFEROUS						
	Removals	1000 m <sup>3</sup>	210	251	260	270	
	Imports	1000 m <sup>3</sup>	48 #	41 #	38	35	
	Exports	1000 m <sup>3</sup>	147 #	175 #	180	180	
	Apparent consumption	1000 m <sup>3</sup>	111	117	118	125	
1.2.1.NC.T	of which, tropical logs						
	Imports	1000 m <sup>3</sup>	0 #	0 #	0	0	
	Exports	1000 m <sup>3</sup>	0 #	0 #	0	0	
	Net Trade	1000 m <sup>3</sup>	0	0	0	0	
1.2.2.C	PULPWOOD (ROUND AND SPLIT), CONIFEROUS						
	Removals	1000 m <sup>3</sup>	257	274	280	290	
	Imports	1000 m <sup>3</sup>	138 #	81 #	80	85	
	Exports	1000 m <sup>3</sup>	53 #	61 #	60	60	
	Apparent consumption	1000 m <sup>3</sup>	342	294	300	315	
1.2.2.NC	PULPWOOD (ROUND AND SPLIT), NON-CONIFEROUS						
	Removals	1000 m <sup>3</sup>	230	250	255	260	
	Imports	1000 m <sup>3</sup>	6 #	2 #	1	1	
	Exports	1000 m <sup>3</sup>	28 #	28 #	30	32	
	Apparent consumption	1000 m <sup>3</sup>	208	224	226	229	
3	WOOD CHIPS, PARTICLES AND RESIDUES						
	Domestic supply	1000 m <sup>3</sup>	708 C	729 C	735	740	
	Imports	1000 m <sup>3</sup>	615 C	635 C	640	645	
	Exports	1000 m <sup>3</sup>	143 C	178 C	180	185	
	Apparent consumption	1000 m <sup>3</sup>	1'181	1'186	1'195	1'200	
1.2.3.C	OTHER INDUSTRIAL ROUNDWOOD, CONIFEROUS						
	Removals	1000 m <sup>3</sup>	7	9	8	8	
1.2.3.NC	OTHER INDUSTRIAL ROUNDWOOD, NON-CONIFEROUS						
	Removals	1000 m <sup>3</sup>	3	4	4	4	
1.1.C	WOOD FUEL, CONIFEROUS						
	Removals	1000 m <sup>3</sup>	569	568	590	600	
1.1.NC	WOOD FUEL, NON-CONIFEROUS						
	Removals	1000 m <sup>3</sup>	1'241	1'231	1'250	1'270	

 <b>TF2</b> <b>UNECE TIMBER FORECAST QUESTIONNAIRE</b> <b>Forest products</b>		Country: Switzerland		Date: 19.10.2015		
Product Code	Product	Unit	Historical data		Estimate	Forecast
			2013	2014	2015	2016
5.C	SAWNWOOD, CONIFEROUS					
	Production	1000 m <sup>3</sup>	986	1'068	1'050	1'060
	Imports	1000 m <sup>3</sup>	370	362	350	350
	Exports	1000 m <sup>3</sup>	177	180	130	140
	Apparent consumption	1000 m <sup>3</sup>	1'180	1'250	1'270	1'270
5.NC	SAWNWOOD, NON-CONIFEROUS					
	Production	1000 m <sup>3</sup>	58	73	75	78
	Imports	1000 m <sup>3</sup>	57	53	45	40
	Exports	1000 m <sup>3</sup>	18	20	18	16
	Apparent consumption	1000 m <sup>3</sup>	98	106	102	102
5.NC.T	of which, tropical sawnwood					
	Production	1000 m <sup>3</sup>	3 N	3 N	3	3
	Imports	1000 m <sup>3</sup>	12	11	10	10
	Exports	1000 m <sup>3</sup>	0	0	0	0
	Apparent consumption	1000 m <sup>3</sup>	14	14	13	13
6.1	VENEER SHEETS					
	Production	1000 m <sup>3</sup>	1 C	1 C	1	1
	Imports	1000 m <sup>3</sup>	4 C	5 C	4	4
	Exports	1000 m <sup>3</sup>	3 C	2 C	2	2
	Apparent consumption	1000 m <sup>3</sup>	2	3	3	3
6.1.NC.T	of which, tropical veneer sheets					
	Production	1000 m <sup>3</sup>	0	0	0	0
	Imports	1000 m <sup>3</sup>	0	0	0	0
	Exports	1000 m <sup>3</sup>	0	0	0	0
	Apparent consumption	1000 m <sup>3</sup>	0	0	0	0
6.2	PLYWOOD					
	Production	1000 m <sup>3</sup>	7 C	9 C	10	12
	Imports	1000 m <sup>3</sup>	99 C	100 C	95	95
	Exports	1000 m <sup>3</sup>	3 C	4 C	5	6
	Apparent consumption	1000 m <sup>3</sup>	103	105	100	101
6.2.NC.T	of which, tropical plywood					
	Production	1000 m <sup>3</sup>	0 N	0 N	0	0
	Imports	1000 m <sup>3</sup>	3 R	3 R	3	3
	Exports	1000 m <sup>3</sup>	0 R	0 R	0	0
	Apparent consumption	1000 m <sup>3</sup>	3	3	3	3
6.3	PARTICLE BOARD (including OSB)					
	Production	1000 m <sup>3</sup>	370	383	392	395
	Imports	1000 m <sup>3</sup>	253	242	240	239
	Exports	1000 m <sup>3</sup>	220	240	245	245
	Apparent consumption	1000 m <sup>3</sup>	402	385	387	389
6.3.1	of which, OSB					
	Production	1000 m <sup>3</sup>	0	0	0	0
	Imports	1000 m <sup>3</sup>	86	80	85	90
	Exports	1000 m <sup>3</sup>	3	2	2	2
	Apparent consumption	1000 m <sup>3</sup>	83	78	83	88
6.4	FIBREBOARD					
	Production	1000 m <sup>3</sup>	539 C	443 C	445	450
	Imports	1000 m <sup>3</sup>	207 C	229 C	210	200
	Exports	1000 m <sup>3</sup>	424 C	370 C	350	340
	Apparent consumption	1000 m <sup>3</sup>	322	302	305	310
6.4.1	Hardboard					
	Production	1000 m <sup>3</sup>	0	0	0	0
	Imports	1000 m <sup>3</sup>	32	29	28	27
	Exports	1000 m <sup>3</sup>	3	4	4	4
	Apparent consumption	1000 m <sup>3</sup>	29	25	24	23
6.4.2	MDF (Medium density)					
	Production	1000 m <sup>3</sup>	200	220	230	240
	Imports	1000 m <sup>3</sup>	69	64	60	55
	Exports	1000 m <sup>3</sup>	193	197	199	201
	Apparent consumption	1000 m <sup>3</sup>	76	88	91	94
6.4.3	Other fibreboard					
	Production	1000 m <sup>3</sup>	339	223	220	225
	Imports	1000 m <sup>3</sup>	106	135	140	145
	Exports	1000 m <sup>3</sup>	228	169	165	168
	Apparent consumption	1000 m <sup>3</sup>	217	189	195	202
7	WOOD PULP					
	Production	1000 m.t.	113 C	136 C	140	140
	Imports	1000 m.t.	164 C	157 C	160	160
	Exports	1000 m.t.	1 C	0 C	0	0
	Apparent consumption	1000 m.t.	277	293	300	300
10	PAPER & PAPERBOARD					
	Production	1000 m.t.	1'215 C	1'258 C	1'265	1'270
	Imports	1000 m.t.	783 C	762 C	765	770
	Exports	1000 m.t.	869 C	914 C	905	910
	Apparent consumption	1000 m.t.	1'128	1'106	1'125	1'130
4.1	WOOD PELLETS					
	Production	1000 m.t.	123	124	130	135
	Imports	1000 m.t.	84	59	60	62
	Exports	1000 m.t.	3	3	3	3
	Apparent consumption	1000 m.t.	204	180	187	194