



Federal Ministry for the
Environment, Nature Conservation,
Building and Nuclear Safety



Beech Forests – UNESCO World Natural Heritage

Protecting a unique ecosystem

Imprint

Published by

Federal Ministry for the Environment, Nature Conservation, Building and Nuclear Safety (BMUB)
Public Relations Division · 11055 Berlin · Germany
Email: service@bmub.bund.de · Website: www.bmub.bund.de/english

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Design

design_idee, büro_für_gestaltung, Erfurt

Printed by

Druck- und Verlagshaus Zarbock GmbH & Co. KG, Frankfurt a.M.

Picture credits

See page 39.

Date

January 2015

Third Print

2,000 copies

Where to order this publication

Publikationsversand der Bundesregierung
Postfach 48 10 09 · 18132 Rostock · Germany
Tel.: +49 30 / 18 272 272 1 · Fax: +49 30 / 18 10 272 272 1
Email: publikationen@bundesregierung.de
Website: www.bmub.bund.de/en/service/publications

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The Ancient Beech Forests of Germany

On 25 June 2011, the UNESCO World Heritage Committee added five of Germany's beech forest regions to the World Heritage List. This extended the transboundary world natural heritage site "Primeval Beech Forests of the Carpathians", located in the Slovak Republic and Ukraine, to include a number of German forest regions, and renamed it "Primeval Beech Forests of the Carpathians and Ancient Beech Forests of Germany".

The German part includes selected forest regions of the National Parks Hainich in Thuringia, Kellerwald-Edersee in Hesse, Jasmund and Müritz in Mecklenburg-Western Pomerania, and the forest of Grumsin in the Schorfheide-Chorin Biosphere Reserve in Brandenburg. These are the most valuable remaining examples of large, undisturbed beech forests in Germany.

These German regions with their lowland and German low-mountain beech forests are an ideal complement to the mountain beech forests found in the Carpathian Mountains. Natural lowland beech forests now only exist in Germany, and the German low mountain ranges have the world's highest concentration of beech forests on nutrient-poor sites. Together with the Primeval Beech forests of the Carpathians, they reflect the broad spectrum of beech forest types in Europe.

Now the various component parts of this extended World Natural Heritage property represent the different forms and local diversity of beech forests and their Post-Glacial development history. If left to nature, the landscape of the temperate zone in Central and Western Europe would be dominated by beech forests.

The development history of beech forests since the Ice Age, the enormous competitiveness of beech (*Fagus sylvatica*) and the diversity of geographical and ecological beech forest variations are a unique global phenomenon. The Ancient Beech Forests of Germany are indispensable to documenting the postglacial colonisation by *Fagus sylvatica* from south to north, from east to west, and spanning



the entire spectrum of altitudinal zones from the seashore, to the lowlands and the submontane belt, to the upper timber line in the mountains. Germany's component parts are the most outstanding examples worldwide of the respective beech forest types. Each component part has its own specific characteristics and local peculiarities that make it unique and irreplaceable.

With the "Ancient Beech Forests of Germany" now recognised as World Natural Heritage, Germany is making a significant contribution to the protection of Europe's beech forests.

Jasmund National Park

(Mecklenburg-Western Pomerania)

The Jasmund National Park is home to the impressive chalky coastline of the island of Rügen, and the peninsula of Jasmund jutting out into the sea with its hilly plains. Its beech forests, chalk cliffs and ocean provided a fascinating backdrop for artists attracted to the region during the Romantic Period, and it remains an exceptionally charming place, with the beech forest appearing to tumble down into the sea.



History

The Jasmund National Park is home to the impressive chalky coastline of the island of Rügen, and the peninsula of Jasmund jutting out into the sea with its hilly plains. Its beech forests, chalk cliffs and ocean provided a fascinating backdrop for artists attracted to the region during the Romantic Period, and it remains an exceptionally charming place, with the beech forest appearing to tumble down into the sea.

Beech Forest type

The 3,000 hectare protected area is home to the largest contiguous beech forest on the Baltic Sea coast, covering some 2,100 hectares. The predominant forest type is the Baltic wood barley beech forest, accompanied by orchid beech forests on steep limestone escarpments, with ash-beech forest in brook valleys, as well as alder marshes and peatlands. On the chalk cliff faces, the beech forest gives way to a dynamic mosaic of open areas, bushland and primeval forest. The forests on the cliff faces remain undisturbed due to their steepness and inaccessibility.

Habitats

Due to the complex interactions between climate, landscape and soil, the Jasmund National Park exhibits an extraordinarily broad range of habitats. The beech forests themselves inhabit a wide range of nutrient-poor to nutrient-rich and dry to damp sites on limestone and glacial deposits, in numerous different variants. Different types of peatland are scattered throughout the forest in a mosaic-like pattern, and the limestone plain is dotted with a network of streams. During the Ice Age, glaciers repeatedly crossed, flattened and compressed the Jasmund chalk block. As the Baltic Sea developed in the Post-Glacial Period, this dynamic limestone coastline emerged from the forest landscape, rising steeply out of the sea.





Flora and fauna

This diversity of habitats provides the basis for a wealth of flora and fauna. Particularly noteworthy are the rare lady's-slipper, the giant horsetail and the coral-root. The limestone cliff face is a breeding ground for peregrine falcons and other birds, and there are several colonies of house martins. The white-tailed eagle also regularly breeds here.

The World Natural Heritage component part

A representative landscape section in the east of the Jasmund National Park, part of which remains undisturbed by humans, has been designated as component part of World Natural Heritage property. It spans ranging from the drift line of the Baltic Sea, across the steep coast to the plains, and covers an area of 493 hectares, surrounded by a 2,511 hectare buffer zone.

Müritz National Park

(Mecklenburg-Western Pomerania)

Anyone visiting the beech forests near Serrahn to the east of Neustrelitz in early May will find themselves enveloped in fresh green leaves. The colourful pageant of late autumn is an equally magical time in this hilly forest landscape, dotted with lakes and peatlands, as is the cool colour palette of winter. An ancient beech woodland has been preserved in the midst of this extensive forest and lake landscape in the Serrahn sub-section of the Müritz National Park, and provides a fascinating glimpse into how the primeval beech forests of Germany must have looked. The forest here has remained untouched for 50 years, allowing us to experience at first hand the development cycles of beech forests.



Beech Forest type

The Müritz National Park, covering a total area of 32,200 hectares, is a protected area of lowland beech forests on base-poor sandy soils formed during the Ice Age in the Serrahn sub-region. The predominant forest type is the melic grass beech forest.

History

The Grand-Dukes of Mecklenburg-Strelitz were passionate hunters, and as a result, the forests around Serrahn were left virtually untouched by silviculture for many years, allowing a valuable and unique nature reserve to develop. The forests around Serrahn were subsequently declared a conservation area, with selected sub-sections being designated strict nature reserves (1961), and eventually became a National Park in 1990. The forests around Serrahn, which had likewise remained undisturbed for decades, were also incorporated into the National Park.





Habitats

The extensive forest landscape is enriched by lakes, peatlands and meadows which combine to create a diverse range of habitats. These numerous biotopes in varying combinations are the distinguishing feature of this charming landscape, and support a wealth of different species.

Flora and fauna

The red deer is the largest mammal to inhabit the protected area. Rare breeds of bird such as the bittern and the crane are typical of the open, undisturbed landscape rich in woodland and water. The highest breeding density of white-tailed eagles and ospreys in Central Europe is found here. The ancient forests around Serrahn also support a diverse range of insect and fungus species that thrive on deadwood.

The World Natural Heritage component part

Central parts of the 6,200 hectare Serrahn sub-section covering an area of some 268 hectares have been included as a component part of the World Natural Heritage property.

Grumsin in the Schorfheide-Chorin Biosphere Reserve (Brandenburg)

The Schorfheide-Chorin Biosphere Reserve to the north-east of Berlin is a fascinating landscape which changes from extensive forest to open land, and from deep valleys to prominent peaks. The pronounced geographical relief reflects the events of the last Ice Age, when glaciers engulfed and transformed the face of the landscape with their mighty ice masses. Grumsin is a very special beech forest that has remained completely undisturbed for 20 years. In these terminal moraine formations, the valleys are dotted with peatlands and small bodies of water, which are closely intertwined with the beech forests to create atmospheric landscape.



Beech Forest type

Grumsin is a protected area of ancient natural lowland beech forest on Ice Age sand and loam soils. The predominant forest type is the millet grass beech forest.

History

Historical research shows that the deciduous forests of Grumsin have been preserved almost in their entirety for several hundred years. In the former German Democratic Republic, the site was a government-owned hunting ground. The restricted access benefited numerous rare species of fauna that are sensitive to disruption. Since 1990, Grumsin has been a significant element at the core of the UNESCO Biosphere Reserve Schorfheide-Chorin. The minimal silvicultural use and general lack of usage for more than 20 years means that the area is characterised by a high proportion of old wood, making the Grumsin beech forests extremely valuable from a nature conservation viewpoint.

Habitats

Deep valleys dotted with a varied range of peatlands and small bodies of water alternate with prominent peaks. This structural diversity in a comparatively small space is home to a wealth of fauna and flora species.





Flora and fauna

White-tailed eagles, black storks and cranes are among the particular ornithological highlights of this area. Tree frogs thrive in the countless small natural bodies of water, and the intact peatlands are home to rare species of plant such as the sundew and cotton sedge.

The World Natural Heritage component part

Grumsin is a component part of the World Natural Heritage property almost in its entirety, and covers an area of 590 hectares.

Hainich National Park

(Thuringia)

In the west of Thuringia, between Mühlhausen, Bad Langensalza and the Wartburg city of Eisenach, the beech forest puts on a dazzling display in spring, when the first rays of strong summer sunlight create enchanting carpets of blooms. Before the ramsons (bear's garlic) the forest with its starry white flowers, the pinkish-lilac hollowroot (corydalis) carpets hundreds of hectares of forest floor. As soon as the ancient beech trees develop their foliage, the forest floor darkens again beneath the canopy, and the competition for light begins, with over 30 species of deciduous trees competing for their place in the sun alongside the dominant beech.



Beech Forest type

Spanning an area of some 7,500 hectares, the Hainich National Park is a protected area of typical low-mountains beech forest on limestone. The wood barley beech forest is the predominant forest type here.

History

For decades, this area was a military no-go zone, which meant that large swathes of forest were left to develop undisturbed for several decades. However, enormous tracts of land were also cleared, providing an impressive example of natural afforestation. Since the National Park's designation in 1997, all usage was discontinued, and central areas have remained untouched for some 50 years.



Habitats

As well as extensive areas of shrubland, deciduous forests with a high proportion of dead wood also contain an exceptional wealth of species and structures. Hainich stands out for its wide diversity of tree species, and the size, intactness and form of its limestone beech forests are unrivalled.



Flora and fauna

Alongside the flora and fauna that are typical of mixed deciduous woodlands, Hainich is also home to a number of highly specialised species. Wild cats, Bechstein's bats, middle spotted woodpeckers, highly endangered deadwood beetles, orchids and numerous species of fungus are all found here. The large areas of shrubland are home to rare species such as whinchats, barbed warblers, red-backed shrikes and wrynecks, along with numerous species of insect.

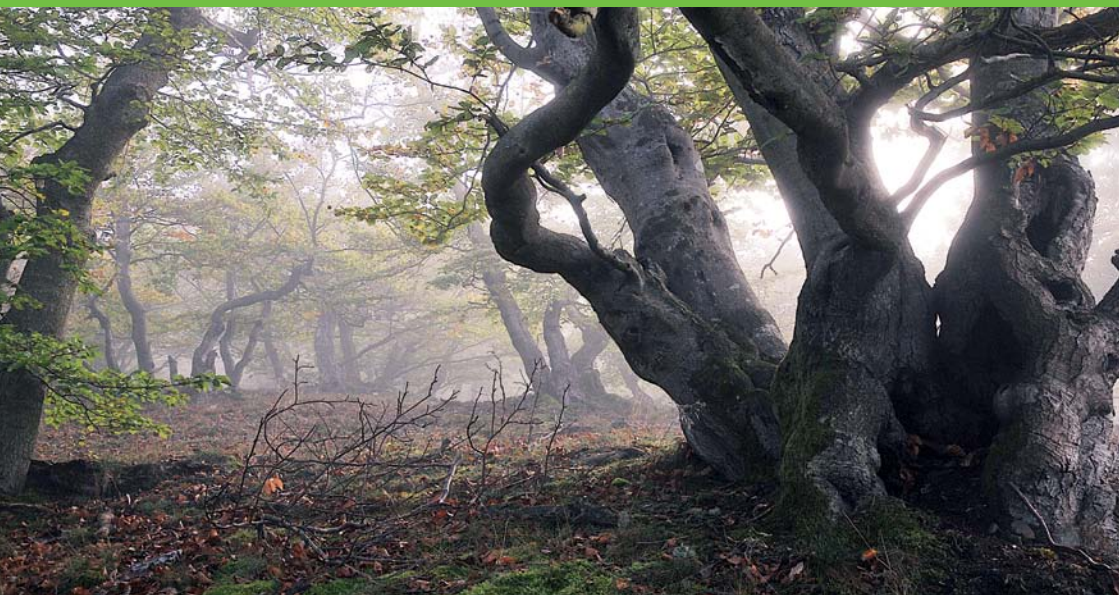
The World Natural Heritage component part

This component of the World Natural Heritage property incorporates the central areas of the National Park with their special ancient beech forests. Its extent and location reflects the broad spectrum of locations for forest ecosystems, and covers an area of some 1,573 hectares.

Kellerwald-Edersee National Park

(Hesse)

In the centre of Germany, south-west of Kassel, is an exceptional beech forest in terms of its size and nativeness to Germany. The peaceful and widespread landscape character of the Kellerwald-Edersee National Park is characterised by more than 50 mountains and peaks. Viewed from the air, the park looks like a sea of beech trees, the extensive ancient forests undissected by roads or settlements. A walk through the forest will be rewarded with frequent vistas of the winding lake Edersee, whose inlets appear almost fjord-like as they extend into the beech forests.



Beech Forest type

The Kellerwald-Edersee National Park covers an area of 5,700 hectares and is home to the acidic-soil beech forest on argillaceous shale and greywacke (rocks created from sediment from primeval seas some 350 million years ago) that is typical of the central German low-mountain region. The predominant forest type is the wood-rush beech forest, often in barren or steep rocky formations. Around half the trees in the present National Park are over 130 years old. A good 1,000 hectares contain beech forests aged 170 years or more, with some as much as 260 years old, and rich in dead wood.

History

Having remained remote from civilization and poorly accessible until the mid-19th century, broad swathes of these extensive forests were used as royal hunting grounds by the Princes of Waldeck and Pyrmont. Silvicultural use of the forest was never a priority, as parts of the landscape are steep and rocky, and therefore difficult to manage. The diversity of habitats for fauna and flora led to the area being earmarked as a nature conservation area as early as 1935. Over the decades that followed, usage was gradually discontinued in almost one-third of the region. In 1990, the majority of the area was designated a forest conservation area, and was finally declared a national park in 2004. In 2010, the Kellerwald-Edersee National Park became the first and only German national park to be certified IUCN Management Category II, having undergone an extensive analysis procedure.

Habitats

On steep rocky slopes, the beech reaches its natural timber line, and forms bizarre forestscapes and primeval, mystic-looking shapes. The remains of natural primeval beech forests, thermophilous oak forests on rocks, as well as mixed deciduous forests on boulder fields and in canyons are to be found here. Some 800 crystal-clear springs and streams, rock vegetation and scree provide further valuable habitats.



Flora and fauna

The broad spectrum of habitats supports a large number of biotic communities typical of a deciduous forest, with countless rare species. Black storks, eagle owls, red kites, honey buzzards and stock doves all breed in the National Park. Home to 7 of 10 Central-European woodpecker species and 18 of the bat species which occur in Hessen, the structural wealth of these ancient forests is evident. Outstanding features of the forests include rare beetles such as the violet click beetle, considered a primeval forest species, and the cheddar pink, a relic plant many thousands of years old which only occurs in Central Europe. Germany has great responsibility for this rare species, as most of the global population is found here. In Hessen the largest cheddar pink population grows in the Kellerwald-Edersee National Park.

The World Natural Heritage component part

The Kellerwald component part of the World Natural Heritage comprises the most representative, contiguous core areas of the National Park, and covers an area of 1,467 hectares.



Europe's Beech Forests



UNESCO World Natural Heritage Site “Primeval Beech Forests of the Carpathians and Ancient Beech Forests of Germany”

The Carpathian Mountains are home to the last remaining large-scale primeval beech forests in Europe. Since the end of the last Ice Age, the forests here have been able to develop undisturbed. Mighty beech trees up to 50 metres high dominate the structurally rich forests. The dynamics of the primeval beech forests, the natural comings and goings, are able to play out entirely free from anthropogenic influences here. Lynxes, wolves and bears all inhabit this fascinating beech forest wilderness, where the complete diversity of species, structures and processes has been preserved. Globally endangered species of fauna, fungus and flora have been able to preserve their natural gene pool.

Since 2007, UNESCO has recognised ten component parts in the Slovak Republic and the Ukraine as the World Natural Heritage “Primeval Beech Forests of the Carpathians”. These areas, located in mountainous and sub-alpine altitudes of up to 1,940 metres, are primarily representative of mountain beech forest.

By extending this property to include the beech forests of Germany, the protected areas now represent the various different forms and locations at all altitudes, and reflect their unique dispersion history in the Post-Glacial Period.

Germany's beech forests are considerably younger, and only a few parts have remained largely free from anthropogenic influences. They are home to a rich diversity of species. Beech forests, with their high proportion of old trees, standing and fallen deadwood, and natural hollows provide ideal habitats for hole-nesting birds, bats and many other living creatures that breed and shelter in them. A large part of this species diversity does not come into its own until the beech forest has reached maturity.

The joint tri-national World Heritage site is now known as “Primeval Beech Forests of the Carpathians and the Ancient Beech Forests of Germany”.

Trilateral cooperation between Germany – Slovak Republic – Ukraine

In July 2007, the World Heritage Committee inscribed the “Primeval Beech Forests of the Carpathians” (Slovak Republic, Ukraine) as a natural heritage property on the UNESCO World Heritage List. Following this tremendous initial success, the next step was to have the Slovak-Ukrainian World Natural Heritage property extended to include a cluster of beech forests in Germany. This required the consent



of both partner countries, as well as a large number of trilateral agreements before Germany was able to submit its application. The first trilateral meeting took place on the Isle of Vilm in Germany back in May 2007, at which the parties agreed to intensify their trilateral cooperation on UNESCO World Natural Heritage, and to focus their attention in particular on the aspired trilateral beech forest world heritage property. This was followed by a series of further meetings, including one at the Carpathian Biosphere Reserve in Ukraine, whose beech forests belong to a World Heritage property, together with those of Havesová in the Slovak Republic, which was also visited by delegates. The trilateral meetings represented an important step in the nomination process to add areas of outstanding beech forest in Germany to the Primeval Beech forests of the Carpathians. One of the most important outcomes of these meetings were concrete agreements on the management of the aspired tri-national property. As partners to this transnational world natural heritage property, we have made a joint undertaking to conserve it. Trilateral cooperation will therefore continue to play an important role in the future.

Realising the vision of a UNESCO World Natural Heritage property: “Europe’s Beech Forests”

Protecting our valuable beech forests more effectively must remain a top priority in the future. The UNESCO World Heritage Committee linked the inscription of the German component parts as World Heritage to a commitment to a European process that will ensure the conservation of Europe’s most valuable beech forests within the framework of a joint world heritage property. Germany, the Slovak Republic and Ukraine are fully committed to this process.

As such, the extension of the Slovak-Ukrainian World Natural Heritage property “Primeval Beech Forests of the Carpathians” to include the “Ancient Beech Forests of Germany” will lend additional weight to European-wide endeavours to protect our beech forests, as well as acting as an incentive for other countries to effectively protect their remaining beech forest assets.



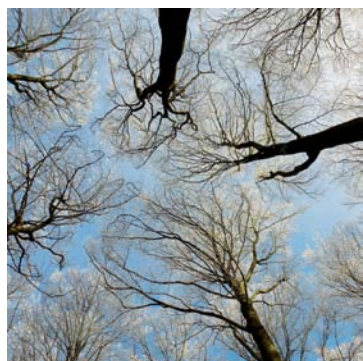
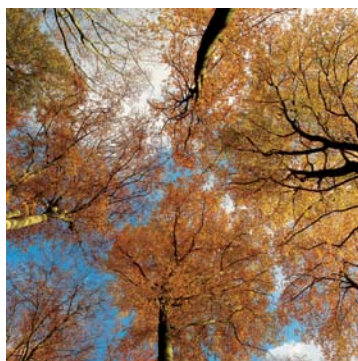
Interesting facts about Beech Forests

Beech Forests – Europe’s primeval forests

All beech forests, however different they may be in terms of their locations and the species communities that they support, share one common feature: They are truly impressive forests. Broad sections of Europe’s landscapes are naturally characterised by beech forests, and to a large proportion of central Europeans, they encapsulate the very essence of the word “forest”.

Beech Forests through the year

Over the course of a year, as well as over the course of their lifetime, beech forests undergo a multitude of processes and phases. In spring they display an impressive carpet of early-flowering plants under the bare branches, followed by an explosion of fresh green foliage, and pronounced darkness on the forest floor during the summer months. This explains the dominance of the beech tree, since few other species are able to thrive in its shade during this period. With the magnificent colours of autumn and subsequent leaf fall, the beech forest changes in appearance once more.





Lifecycles of a Beech Forest

As it matures, the beech forest undergoes a number of further, equally impressive phases. Germination, crowding of young trees during the initial years, decades of fierce competition for space, water and light, maturing to imposing tree formations, followed by death and decomposition. As a result of man's influence, and because timber is harvested long before the decay sets in, we are unaccustomed to the sight of ageing and dying trees. Yet deadwood is just as much a part of life in a beech forest as the small dark-green saplings that take the place of the old tree.

In primeval and ancient beech forests, the various different phases of life coexist simultaneously. They develop their own momentum, and are distinguished by a high level of structural diversity.

Species diversity of Beech Forests

Although beech forests are shady and dark in summer, and may appear to have a paucity of species compared with some mixed deciduous forests, nothing could be further from the truth. Natural beech forests with a high proportion of old trees, standing and fallen deadwood provide an ideal habitat for numerous species of fauna and flora. They contain many natural hollows in which hole-nesting birds, bats and many other living creatures are able to breed and shelter. A significant proportion of the species diversity in beech forests does not come into its own until the forest enters the latter phases of its lifecycle. The entire regeneration cycle of beech forests – in other words, the period during which the beech tree grows, bears fruit, ages, dies and decomposes – is between 250 and 300 years, in some cases even longer.



This regeneration cycle, coupled with the broad spectrum of beech forest locations, means that virtually all Central European tree species will occur at some point or other in a beech forest. The total number of plant species found in the various location-specific and geographical forms of the beech forest is therefore remarkably high. The structural diversity of the beech forest is further enriched by a wide range of special locations such as springs, streams, and small bodies of water, peatlands, rocks, caves and screes.



It is estimated that up to 10,000 species of animal live in beech forests. In recognition of its importance for many species, including some that are threatened with extinction, the beech forest was named Biotope of the Year in Germany in 1995.

Features and spread

Beech forests are deciduous forests that are clothed in a mantle of green foliage during the summer months, and are almost exclusively confined to the moderate zone of the Northern hemisphere. Deciduous forests dominated by the European beech (*Fagus sylvatica* L.) are only found in Europe. Without man's influence, beech forests would dominate the landscape in Central and Western Europe and would cover more than two-thirds of Germany's land mass.



The beech is also known as the red beech for its reddish-white wood. Thanks to its ecological assertiveness, from small refuges in the south and south-east of Europe, since the Ice Age it has been able to colonise broad swathes of Europe. It thrives in cool, temperate climates. It only exists in Europe, with Germany being its main distribution area. Worldwide, there are 14 known species of beech, including the oriental beech, closely related to our own European beech, which is found primarily in areas of the Black Sea, the Caucasus and Northern Iran. The beech has immense competitive vigour and colonises nearly all types of terrain: from rich calciferous to poor sandy soils, from mountains to lowlands, and from damp to dry sites. It also has the capacity to tolerate shade with vigorous growth. Only a few adapted species of flora can thrive in its shade, so it is usually other beech trees that grow beneath the leaf canopy of larger beech trees. Despite the dominance of a single tree species, beech forest is the preferred habitat of many thousands of species of fauna, flora and fungus.

It is thought that the beech has not yet reached its climatic distribution boundaries. The vigour of its expansion therefore continues unhindered. The re-immigration of trees and the development of forests after the Ice Age is still ongoing here – a process that cannot be observed anywhere else in the world. What is also extraordinary is the pronounced seasonal cycle of the beech forest, with its early spring-flowering plants, the vivid colours of its foliage in autumn, and subsequent leaf drop.

Beech Forests in Germany

Germany is beech country. It accounts for around one-quarter of the total natural distribution area of the European beech. Many types of beech forest are only found here, at the core of its natural range, including the wood-rush beech forest, wood melick grass forest, wood barley beech forest etc. Beech forests therefore represent a significant proportion of biological diversity in Germany.

In the primeval forests of Germania, which remained extensive until Roman times, the European beech was the dominant tree species. The natural distribution area of the beech in Germany extends from the coastal regions, through the North German plain, across the downlands and Central German low-mountain regions in the heart of Germany, and into the upper elevations of the Alps. Due to the onward march of civilisation, beech forests today only cover a fraction of their potential natural distribution area (approximately 7 percent). Almost all of our remaining beech forests are used for forestry or have been culturally modified. Stands of old growth and dead-wood structures are often lacking. Beech stands and individual beech trees that are more than 200 years old, as well as larger contiguous areas of beech forest, are very rare. Remnants of natural lowland beech forests now only exist in Germany, and are not found anywhere else in the world.



Since the days of Charlemagne, there has been large-scale forest clearance to make way for agricultural development. The industrial development of the 18th and 19th centuries would have been inconceivable without timber as a basic raw material. From the late 18th century onwards, faced with a drastic shortage of timber, in many forests the beech was displaced by faster-growing conifers. Today, almost all that remains of Europe's once-extensive beech forests are a few isolated patches of varying sizes. Ancient beech forests are now rare, and are mainly confined to difficult-to-manage sites. From a global perspective, they are therefore ranked as highly endangered habitats, even though the beech species itself is not endangered at all.



UNESCO World Heritage

The UNESCO World Heritage Convention

The “Convention Concerning the Protection of the World Cultural and Natural Heritage”, also known as the World Heritage Convention, was adopted by UNESCO in 1972. It is the single most important international instrument for protecting our cultural and natural heritage. To date, 191 countries have ratified the Convention, including Germany in 1976.



Protecting and conserving our unique heritage

The principal concept behind the World Heritage Convention is “... that parts of the cultural or natural heritage are of outstanding interest and therefore need to be preserved as part of the world heritage of mankind as a whole”. The outstanding universal value of these properties is of such extraordinary importance that it transcends national borders, and is relevant to both current and future generations. World Heritage properties are therefore not under the sole ownership of

the states in whose territory they are located, but rather belong to mankind as a whole. World Natural Heritage properties are unique natural phenomena, whilst World Cultural Heritage properties denote superlative achievements in human culture. These unique natural landscapes, habitats for animals and plants, geological formations, cultural landscapes and cultural assets together make up the UNESCO World Heritage List, the most important instrument established under the World Heritage Convention. The main criteria for inclusion in the World Heritage List are a property's outstanding universal value, its integrity, and its assured protection. Contracting Parties may apply for the inscription of suitable sites located within their sovereign territory. By submitting a nomination, they are acknowledging the universal importance of such sites, and undertake to preserve them for future generations.

Another mechanism created by the World Heritage Convention is the “List of World Heritage in Danger”, a kind of “Red List” of World Heritage properties considered to be at particular risk. In some cases, conserving such sites requires the support of the international community.

The World Heritage List

The World Heritage List currently comprises 1007 sites in 161 countries, of which 779 are Cultural Heritage properties and 197 Natural Heritage properties (Photo: Victoria Falls), together with some 31 so-called “mixed sites” which are both Cultural and Natural Heritage at the same time. The “List of World Heritage in Danger” names 44 sites, including the Rain Forests of Sumatras and the Old City of Jerusalem (as of July 2014).





World Natural Heritage

The Geirangerfjord in Norway, Lake Baikal in Russia, the Galapagos Islands in Ecuador (photo top of the page) and the Serengeti in Tanzania (Photo Page 30) are just four of the World Natural Heritage properties currently inscribed by UNESCO.

Not all sites are as well-known as those listed above. World Natural Heritage sites also include less well-known natural treasures such as the Bwindi National Park in Uganda with its mountain gorillas, the Skocjan Caves in Slovenia, and the Ogasawara Islands in Japan.

Article 2 of the World Natural Heritage Convention defines “natural heritage” as

- Natural features consisting of physical and biological formations or groups of such formations, which are of outstanding universal value from the aesthetic or scientific point of view

- Geological and physiographical formations and precisely delineated areas which constitute the habitat of threatened species of animals and plants of outstanding universal value from the point of view of science or conservation
- Natural sites or precisely delineated natural areas of outstanding universal value from the point of view of science, conservation or natural beauty.

World Heritage properties in Germany

A glimpse at the current World Heritage List reveals a major imbalance between cultural and natural sites, both at a global and national level. Out of a total of 39 World Heritage Sites in Germany, only three are Natural Heritage – the Messel Fossil Pit in Hesse, the Wadden Sea and, since June 2011, the Ancient Beech Forests of Germany. The remaining 33 are all Cultural Heritage sites such as the Cologne Cathedral (Photo below), the Muskauer Park and the former Zeche Zollverein Coal Mine Industrial Complex in Essen.



The 39 UNESCO World Heritage Sites in Germany are:

- Aachen Cathedral (date of inscription: 1978)
- Speyer Cathedral (1981)
- Würzburg Residence with the Court Gardens and Residence Square (1981)
- Pilgrimage Church of Wies (1983)
- Castles of Augustusburg and Falkenlust in Brühl (1984)
- St. Mary's Cathedral and St. Michael's Church at Hildesheim (1985)
- Roman Monuments, Cathedral of St. Peter and Church of Our Lady in Trier (1986)
- Hanseatic City of Lübeck (1987)
- Palaces and Parks of Potsdam and Berlin (1990)
- Abbey and Altenmünster of Lorsch (1991)
- Mines of Rammelsberg, Historic Town of Goslar and Upper Harz Water Management System (1992)
- Town of Bamberg (1993)
- Maulbronn Monastery Complex (1993)
- Collegiate Church, Castle and Old Town of Quedlinburg (1994)
- Völklinger Ironworks (1994)
- Messel Pit Fossil Site (1995)
- Cologne Cathedral (1996)
- Bauhaus and its Sites in Weimar and Dessau (1996)
- Luther Memorials in Eisleben and Wittenberg (1996)
- Classical Weimar (1998)

- Wartburg Castle (1999)
- Museumsinsel (Museum Island), Berlin (1999)
- Garden Kingdom of Dessau-Wörlitz (2000)
- Monastic Island of Reichenau (2000)
- Zeche Zollverein Coal Mine Industrial Complex in Essen (2001)
- Historic Centres of Stralsund and Wismar (2002)
- Upper Middle Rhine Valley (2002)
- Town Hall and Bremen Roland on the Marketplace of Bremen (2004)
- Muskauer Park (2004)
- Frontiers of the Roman Empire: Upper German-Rhaetian Limes (2005)
- Old Town of Regensburg with Stadtamhof (2006)
- Berlin Modernism Housing Estates (2008)
- Wadden Sea (2009)
- Fagus Factory in Alfeld (2011)
- Prehistoric Pile Dwellings around the Alps (2011; transnational site with France, Italy, Austria, Switzerland, Slovenia, German part: Remains of prehistoric pile dwelling settlements at Lake Constance, in Upper Swabia, south of Augsburg and at Lake Starnberg)
- Ancient Beech Forests of Germany (2011; transnational site together with the Primeval Beech Forests of the Carpathians in Slovak Republic/Ukraine, 2007)
- Markgräfliches Opernhaus Bayreuth (2012)
- Bergpark Wilhelmshöhe (2013)
- Karolingisches Westwerk und Civitas Corvey (2014)

Stepping up Germany's efforts to protect our natural assets

In 2004, the Federal Agency for Nature Conservation (BfN) on behalf of the Federal Environment Ministry commissioned a research project to assess the World Heritage potential of German areas of outstanding natural value.

The first step was to identify potentially suitable sites for nomination as UNESCO World Natural Heritage properties in Germany. The natural sites thus identified were then assessed to determine their chances of success. The reviewers also considered a number of so-called “serial nominations” spanning several individual areas. Countries also have the option of joining forces with others to submit a serial nomination, something which is particularly relevant for natural heritage sites in Europe. Intensive human settlement means that many of Europe's natural habitats are highly fragmented and isolated, and their global importance must be considered from a European-wide perspective.

The comparative analysis assessed a large number of natural assets, and concluded that the German beech forests were particularly strong candidates. In 2006, a more in-depth feasibility study analysed the chances of a successful nomination for Germany's beech forests. This culminated in the proposal to nominate five German beech forest areas as a World Natural Heritage to complement the Primeval Beech Forests of the Carpathians.







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