



GEO Certified®

GEO Certified® Report Viborg Golfklub

Prepared by independent verifier Marten Nilsson

Certified by GEO Foundation: 2024
Recertification due: 2027

GEO Certified®

 **GEO
Foundation**
Sustainability in and through golf

“At Viborg GK, the environmental impact of the club and its activities has been a focus area since the mid-1990s. Since receiving its first GEO certification, the greenkeeper and club representatives have continuously worked on various projects on the course and within the facilities, always with a strong awareness of their environmental implications. The results are impressive and serve as an excellent example of what can be achieved within a golf club—maintaining high-standard playing areas and facilities while also reducing environmental impact. The greenkeeper’s commitment to understanding wildlife ecology and using poison-free methods to protect the playing areas—while simultaneously supporting conditions for specific species—is beneficial to everyone.”

Marten Nilsson
(GEO accredited independent verifier)



Introduction

GEO Foundation is pleased to confirm that Viborg Golfklub has successfully achieved GEO Certified® status for its outstanding work to foster nature, conserve resources and support the community.

GEO Certified® is the most respected certification for golf, based on a credibly and transparently developed modern sustainability Standard of best practice.

Viborg Golfklub has:

1. Met the required certification criteria for sustainable golf operations
2. Successfully completed the official third-party verification process
3. Successfully passed the final evaluation by GEO Certification Ltd. (autonomous subsidiary of GEO Foundation)

GEO agreed with the conclusions of the official verification report, that, having achieved all mandatory criteria; and with specific Continual Improvement Points (CIP) set for the future and Critical CIP's (CCIPs) to be reviewed at recertification, Viborg Golfklub should be awarded GEO Certified® status.

For the certification period stated above, Viborg Golfklub can therefore claim a position as a leader in advancing sustainability in golf – making important contributions in protecting nature, conserving resources and strengthening communities.

The GEO Certified® Report that follows comments on the actions undertaken against the criteria, as observed by the independent verifier during the assurance process.

Certification is nearly always the result of a dedicated team effort resulting in many practical and valuable social and environmental results around the golf course, maintenance facility and clubhouse. These dedication and leadership qualities are an important part of ensuring the resilience of the golf facility and the golf industry into the future and also as part of society's wider effort to pull together for people and planet.

We congratulate all involved.

Jonathan Smith
Founder and Executive Director, GEO Foundation
GEO Certification Ltd. Board Member

Kelli Jerome
Executive Director, GEO Foundation

Carole Kerrey
Director, Certification and Credibility,
GEO Certification Ltd.



Verification and Certification

Verification

The official third-party audit was carried out by an independent verifier, accredited by GEO to undertake verifications of golf facilities applying for certification.

Verification involves reviewing practices and data, using the International Voluntary Standard for Sustainable Golf Operations as the guide to ensure comprehensive and consistent evaluation of performance. A detailed verification report is submitted for evaluation by GEO Certification Ltd, a subsidiary of GEO Foundation.

Certification

GEO Certification Ltd, an autonomous subsidiary of GEO Foundation [both not-for-profit entities], undertook a full review of all content submitted through the OnCourse® online platform and the report submitted by the verifier, ensuring:

- Comprehensiveness – that activities undertaken touched on all elements of the Standard
- Consistency – that the verification approach was balanced, well weighted and with consistent depth of evaluation across each theme
- Accuracy - matching the verification report with evidence submitted by the golf facility to ensure statements and claims were accurate

GEO Foundation is an international not-for-profit founded to advocate, support and reward sustainability in and through golf. Over more than ten years, the group has worked collaboratively with dozens of golf industry associations and government and non-government organisations around the world, to help golf become a sustainability leader, striving for a net positive social and environmental impact. In addition to managing and assuring GEO Certified®, GEO Foundation also provides a suite of credible, practical programmes for golf facility management, new golf developments and golf tournaments called OnCourse®, often delivered in partnership with national golf bodies. Find out more at www.sustainable.golf

Credibility

GEO Certified® is part of the ISEAL Alliance, a group of the world's foremost credible certification systems including Fairtrade, Rainforest Alliance, Forest Stewardship Council, Marine Stewardship Council and many others. GEO Foundation earned and retains full membership of the ISEAL Alliance global association following a rigorous evaluation against the ISEAL Codes of Credibility in Sustainability Standards and Certification. The ISEAL Codes cover standard-setting, assurance, and monitoring and evaluation. Find out more at www.isealliance.org



Verifier's Report

The Sustainability Agenda for golf covers the following themes and action areas:

THEMES	ACTION AREAS
Nature	• Habitats & Biodiversity • Turfgrass management • Pollution prevention
Resources	• Water • Energy • Materials
Community	• Partnerships & Outreach • Golfing & Employment • Advocacy & Communications

Included below are the observations made by the Independent Verifier against each item in the Standard.

NATURE			
N1 Habitats and Biodiversity			
Objectives	Requirements	Mandatory Practices	Verifier Notes
N1.1 Understand the site and surroundings	N1.1.1 Sound understanding of the nature and landscape value of the site	Map all habitats and vegetation types on the site; Regularly update landscape / biodiversity surveys	Several surveys have been conducted and uploaded to OnCourse. The golf course is located within a forest area. The forest is owned by the local municipality. The forest is managed as a preserved area but has no formal protection. There are various types of habitats, with grasslands, shrubs and forests mixed in the large area that encompasses the golf course.
	N1.1.2 Knowledge of legal designations for protected areas, habitats and species	Understand legal responsibilities for protected landscapes and species; Record and monitor protected, endangered, or rare species found on the site	There are no special designations. The lakes and immediate surroundings of the lakes that lie close to the clubhouse are managed by the municipality.
	N1.1.3 Understanding and respect for cultural heritage	Protect any archaeological, historical or cultural designations on the site	The area surrounding the city of Viborg including the area of the golf club has many archaeological findings and sites. There are several burial mounds close to the playing areas. When performing digging or other groundwork the club has agreed in collaboration with local authorities to keep above ploughing depth to avoid any damage to undiscovered or known archaeological values.
N1.2 Opportunities to naturalise the course	N1.2.1 Measures taken to identify and minimise the required area of managed turfgrass	Observe, track and / or monitor golfer play	Areas alongside some of the holes are left uncut. The greenkeeper has a dialogue with members and the board to widen uncut areas where possible. This process is ongoing with areas widened in some places and previous widened areas reduced if interfering with play.
N1.3 Actively manage habitats for wildlife	N1.3.1 Projects to manage habitats in the best way for wildlife and golf	Regularly review and follow a habitat management plan; Prioritise native species when planting and landscaping	Forest areas are largely left for natural development including leaving dead wood as it is. Uncut areas are left to develop natural forests without plantation of trees. Trees and bushes are allowed to grow along a spreading corridor crossing the course area from east to west, thus helping several species that require shelter while spreading.

N1.4 Conserve key species	N1.4.1 Practical conservation measures for priority species		Salt rocks for deer are mounted in the forest areas. A pit is dug out in the forest. This constantly holds water for deer to utilise. Birdhouses for various types and sizes of birds are mounted in the forests. A strategy to reduce the damage caused to green areas by the Garden Foliage Beetle (<i>Phyllopertha horticola</i>) is developed by the greenkeeper. The strategy involves pheromone traps that if / when the level of activity is measured to be high a watering scheme for greens is introduced where the green areas are watered for 4 mins every hour. This creates an unfavourable environment for the beetles and significantly reduces the damage caused. The watering scheme is activated only when pheromone traps show high levels of beetles and thus not every year. A winter storm a few years back felled several trees, and the roots of the trees were collected and placed alongside the course. This area has since been overgrown with grass and other vegetation and is being cut once a year. The resulting area has become a popular ground for vole and other rodents and has then also become the hunting ground for prey birds including the long-eared Owl (<i>Asio otus</i>). There is an area between the lakes where lesser newt (<i>Lissotriton vulgaris</i>) has been observed migrating. The grass area is left uncut during mating season (March – April) to protect migrating individuals.
N2 Turfgrass			
N2.1 Maintain optimum turf and soil health	N2.1.1 Appropriate turfgrass varieties adapted to climatic and other geomorphological factors	Select appropriate grass species for climate	The greenkeeper is very well aware of the requirements for various species of grass regarding fertiliser and water need in relation to the local climate. On greens, the mix of species currently is <i>Agrostis stolonifera</i> 30%, <i>Festuca rubra</i> 30%, <i>Poa annua</i> 30% and <i>Agrostis capillaris</i> 5%.
	N2.1.2 Practices to maintain good soil structure and condition		Practices discussed and confirmed.
	N2.1.3 Careful and responsible fertiliser application throughout the year to avoid over-fertilisation	Undertake soil tests and nutrient analysis	Every second-year soil test is performed on green areas and occasionally also for fairways.

N2.2 Prioritise mechanical maintenance	N2.2.1 Non-chemical pest, disease and weed management	Sharpen mowing blades; Remove surface moisture; Hand weeding	The greenkeeper has tried out various levels of fertilisers and analysed the outcome of how much pesticides is needed. When no fertilisers are used grass become weaker and is to a greater extent attacked by fungi and other pests. Hence some level of fertilisers is needed to reduce the need of pesticides. The current level of fertiliser use still implies some use of pesticides, but it is difficult to reduce the use further down without risking the playing experience.
N2.3 Use chemicals responsibly	N2.3.1 Application of chemicals only when necessary to prevent or cure defined / identified turf health issues	Establish patterns and levels of risk for pests and diseases; Scout the course daily for early signs of pests and disease; Accurate pest and disease identification; Map and track pest and disease hotspots; Establish pest and disease thresholds	Application is adjusted according to actual seasonal conditions. Level of use varies accordingly from year to year.
	N2.3.2 Application of chemicals with full safety precautions	Use only legally registered and approved products; Ensure staff are fully qualified and licenced to use pesticides; Regularly calibrate and test applicators; Use appropriate protective equipment; Dilute and dispose of leftover product on untreated areas of turf .	Only legal products are used. Staff are certified to use pesticides. Protective equipment is used when products are applied. Disposal of hazardous waste is handled according to legal requirements and is discarded at a local municipality waste and recycle centre on a regular basis.
N3 Pollution Prevention			
N3.1 Prevent pollution across the entire site	N3.1.1 Practical measures to ensure pollution risks are minimised from golf course operations	Document procedures for emergency spill responses; Maintain mowing buffer zones around water and all ecologically sensitive areas; Maintain spraying and spreading buffer zones around water and all ecologically sensitive areas; Create a map / aerial visual reproduction, drawing etc of the course showing buffer zones and no-spray, no-spread areas.	Mowing buffer zones are maintained around lakes and ponds. Rough areas close to forests are maintained, mowed once a year.
	N3.1.2 Practical measures to ensure pollution risks are minimised from clubhouse operations	Ensure all hazardous materials are safely and securely stored; Ensure compliance with all required standards and systems for hazardous waste and wastewater discharge	Storage is in a locked room, approved by authorities. Waste and wastewater discharge follow legal requirements and are regularly inspected by local authorities.

	N3.1.3 Practical measures to ensure pollution risks are minimised from maintenance facility operations	Ensure wash areas are on impermeable, leak-free surfaces; Mixing and loading of pesticides and fertilisers over an impermeable surface; Triple rinse pesticide containers and applicators	Liquid fertilisers are applied; mixing does not occur at the site. Washing is done on a leak-free surface.
N3.2 Safely manage hazardous substances	N3.2.1 Legal compliance in the storage, handling, application and safe disposal of all hazardous substances	Maintain a register of hazardous materials available to authorised staff; Safe storage in secure and ventilated concrete or metal building; Sufficient storage capacity; Impermeable flooring; Spill containment kits present; Emergency wash area; Fire extinguisher in the immediate area; Secondary containment for fuel, either externally constructed, or integrally manufactured; Regular inspection of storage tanks	Environmental authorities perform regular inspection of the premises and storage of hazardous substances. Fuel storage is in a double walled container. All hazardous substances are logged in a register. Fire extinguisher hangs on the wall. Concrete floor.
N3.3 Responsibly manage waste / storm water	N3.3.1 Appropriate wastewater usage and discharge licences	Wastewater discharge licence; Appropriate treatment of machinery wash water (impermeable surface, oil / grease / clipping separation)	Water used for cleaning machinery is recycled and used as irrigation of the driving range. Washing is done on impermeable concrete ground with water collection.

RESOURCES

R1 Water

Objectives	Requirements	Mandatory Practices	Verifier Notes
R1.1 Minimise water demand	R1.1.1 Measures to reduce the need to consume water	Target irrigation to essential playing surfaces only	Fairways and greens are irrigated on a need to basis. Grass species are optimised with regards to the local conditions at the site. The greenkeeper has tried various mixes of species with the aim to reduce pesticide use. Development of grass species and the research work by STERF is continuously integrated in grass management.

R1.2 Maximise water efficiency	R1.2.1 Practical measures to use water more efficiently on the golf course	Conduct regular irrigation performance checks; Provide staff training on efficient irrigation practices; Ensure effective application of water to target areas; Ensure irrigation schedules are informed by weather patterns and soil moisture analysis	Since 1997, the club has been working to reduce environmental impact. They have managed to reduce the amount of water used by approx 50%. Currently the usage is 15000 cubic meter/year. The club is about to install a supplementary pump system that runs on a lower amount of energy. The irrigation system is automated, but scheduling is maintained manually. We discussed to some extent the installation of sensors that can measure ground moisture levels. This is an investment that is perhaps possible in the future. CIP: Please continue to explore the feasibility of improving soil moisture monitoring to inform and improve irrigation efficiency.
	R1.2.2 Practical measures to use water more efficiently in buildings	Audit water use regularly; Review bills frequently and look for irregularities; Encourage water-saving practices amongst staff and visitors; Categorise and track water consumption	Water saving equipment is installed in the clubhouse and maintenance facility. Consumption of water is monitored regularly.
R1.3 Source water responsibly	R1.3.1 Measures towards alternative, lower quality sources of water	Ensure appropriate water abstraction permit and reporting, as required	The water used for irrigation is not drinking water and is pumped out of the ground by the club itself.
R2 Energy			
R2.1 Reduce energy demand	R2.1.1 Measures to reduce the amount of energy consumed in course maintenance	Minimise areas of managed turf to reduce mowing, irrigation, and turf inputs	See R1.2 on new water pump. Hybrid machines are used for mowing. One fully electric mowing robot is installed that mows the fairway on the hole closest to the clubhouse. More electric machines are in the pipeline.
R2.2 Maximise energy efficiency	R2.2.1 Measures to use energy and fuels more efficiently in buildings	Audit energy use regularly; Regularly review bills; Categorise and track energy consumption	The club has been reviewing energy consumption, water use, pesticide use etc for a number of years. This is summarised in a report that can be found at: https://www.viborggolfklub.dk/banen/miljoe-pasning-banen/groenne-regnskaber-sproejtemiddelbelastning/

R2.3 Source energy responsibly	R2.3.1 Measures to source alternative, renewable forms of energy	Determine potential sources of renewable energy in the area and on-site, through renewable energy providers	Installed solar panels produce approx 30 % of yearly consumption.
R3 Materials			
R3.1 Reduce materials demand	R3.1.1 Products and materials selection based on necessity, including opportunities for recycled, reused and locally sourced alternatives	Undertake a review of materials consumed	Recycling of glass, paper, plastics and metal is handled by the local waste management service. This is by law in Denmark.
R3.2 Purchase responsibly	R3.2.1 Practical use of an ethical / environmental purchasing policy	Adopt a sustainable, or ethical / environmental purchasing policy to maximise the use of locally sourced goods and goods made from recycled, recyclable and certified materials	The club has a policy to buy goods locally as far as it is possible.
R3.3 Reuse and recycle	R3.3.1 Waste stream separation for maximum recycling and re-use opportunity	Demonstrate waste separation, reuse and recycling; Track how much waste goes to landfill, or is reused / recycled	The local municipality decides what materials can be recycled on a regular basis. Metal is collected separately in a container. There is no recycling of food waste offered by the municipality. Batteries and other hazardous material is collected and disposed by the club on a regular basis. A wood chip machine is installed for reuse of chopped down small trees. Wood chips are then used on pathways and elsewhere in the playing area.
R3.4 Demonstrate legal compliance	R3.4.1 Compliance with all local and regional waste management regulations	Use authorised waste and recycling contractor for general, hazardous, industrial and green waste	It is handled by local waste manage service in collaboration with local authorities.

COMMUNITY

C1 Outreach

Objectives	Requirements	Mandatory Practices	Verifier Notes
C1.1 Diversify access and provide multi-functionality	C1.1.1 Social and recreational activities at the facility		The Danish Bird Association arranges excursions to the golf course area.
C1.2 Provide for volunteering and charity	C1.2.1 Opportunities available for volunteering and support of charities and good causes		There are no charity activities or similar. This is not common practice in the Nordic countries including DK.
C1.3 Establish active community partnerships	C1.3.1 Positive and constructive engagement with neighbours, the local community and other groups	Create a 'sustainability working group'	The club arranges a yearly meeting with all neighbours to the golf club to ensure a continuous friendly atmosphere. The club advertises its environmentally conscious profile on the web site and raises awareness through regular communication with golf club members. The general opinion among club members is that the club is working actively with its environmental impact.

C2 Golfers & Employees

C2.1 Improve health and wellbeing	C2.1.1 Benefits to human physical and mental health from golf and facility activities		Most people do not use golf carts and are walking which is a benefit to people's general health.
C2.2 Be open and inclusive	C2.2.1 Inclusivity and diversity in membership and visitor policies	Demonstrate inclusive policies for members and visitors	The board has a gender inclusion policy to ensure members of the board are represented by both men and women.
C2.3 Employ fairly and safely, and provide career opportunities	C2.3.1 Ethical and legal employment, working conditions and professional development	Follow all relevant national legislation and best practice for employment, health & safety etc	Staff are continuously educated on issues like first aid, safety regulations.

C3 Communications

	C3.1 Engage golfers and members	C3.1.1 Communications activities that raise awareness and understanding amongst members and visitors	Provide information on the facility's sustainability commitments, actions, or achievements	CIP: Please continue to explore opportunities to improve sustainability education and communication for members, visitors and the local community,
	C3.2 Celebrate and promote sustainability	C3.2.1 Activities that raise awareness and engage people in the wider community	Provide evidence of external communications and community engagement	A bike competition is held in the forest of the course area. Several walking paths cross the golf course area.

Golf and Sustainability

Among all sports, golf has a particularly close relationship with the environment and communities, golf facilities can bring many benefits to people and nature - from the protection of greenspace and conservation of biodiversity; healthy recreation for all ages; local supply chains; and jobs, tourism and other forms of economic value.

Adopting a more sustainable approach is also good for golf. It's about presenting a high-quality golf course and providing a memorable experience in natural surroundings. It's about being as efficient as possible. And it's about supporting the community in a range of ways that bring increased recognition, respect and contact.

At a broader level, it's important that golf credibly demonstrates its commitment, and its social and environmental value – strengthening the sport's image and reputation for the long term.

Golf facilities that participate in OnCourse®, an international sustainability initiative assured by the non-profit GEO Foundation, are taking a comprehensive approach and striving to be leaders in the community.

Find out more at www.sustainable.golf