

GEO Certified® Report Golfclub Kagerzoom

Prepared by Independent Verifier, Adrie van der Werf

Certified by GEO Foundation: April 2021 Valid until: April 2026



"Golfclub Kagerzoom has worked along sustainability criteria for many years and are still finding ways to improve. Situated in a densely populated area, the course offers relaxation opportunities to golfers and quite some possibilities for nature development on the non-playing areas. There is also an opportunity to collaborate with the adjoining business facilities and increase the visibility of sustainable practices and benefits."

Adrie van der Werf
GEO accredited Independent Verifier



Introduction

GEO Foundation is pleased to confirm that Golfclub Kagerzoom 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.

Golfclub Kagerzoom 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 set for the future, Golfclub Kagerzoom should be awarded GEO Certified® status.

For the certification period stated above, Golfclub Kagerzoom 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

Milm Alin

Richard Allison

Manager, GEO Certified Facilities



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.isealalliance.org



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

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

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

NATURE			
N1 Habitats and B	iodiversity		
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	Based on reports 2010-2020, the club now has a good overview of all vegetation types and areas of interest on the 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	See N1.1.1 Surveys are undertaken once every few years, and during our discussion the club clearly demonstrated knowledge of species of interest and how to protect (enhance) them.
	N1.1.3 Understanding and respect for cultural heritage	Protect any archaeological, historical or cultural designations on the site	N/A. A well described historical overview of the area is available
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	The 9 holes course is situated on roughly 23 ha, and about 50% of the surface area is maintained as golf course and roughly 25% as nature areas. Several nature projects are in practice, like e.g. development of species rich meadows, creating nestling possibilities for kingfishers
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	Where possible designated areas for further nature development have been established; during our meeting, the club presented an overview of actions with respect to nature development and conservation. The club monitors bats and created nesting opportunities for e.g. kingfishers. A nice booklet on Flora and Fauna on the golf course is available
N1.4 Conserve key species	N1.4.1 Practical conservation measures for priority species		See N1.3
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	A good overview of grass species present on the course is available and was confirmed during inspection; % of Poa on greens fluctuates and is manageable according to the greenkeeping staff.
	N2.1.2 Practices to maintain good soil structure and condition		
	N2.1.3 Careful and responsible fertiliser application throughout	Undertake soil tests and nutrient analysis	During the course visit this was discussed thoroughly, application rates vary between years and specific parts of the course. In

	the year to avoid over- fertilisation		general these application rates are highly acceptable. No changes are expected the coming years.
N2.2 Prioritise mechanical maintenance	N2.2.1 Non-chemical pest, disease and weed management	Sharpen mowing blades; Remove surface moisture; Hand weeding	Standard practices are applied, like daily scouting, to keep pests and diseases as low as possible, and since 2020 pesticides are not in use anymore. Nesting opportunities for starlings have been introduced, in the hope that the starlings may reduce plagues of e.g. grubs.
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	See N2.2
	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	Applicators are fully licensed and all equipment is according to legislation
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.	Buffer zones near waterbodies are present. It is suggested to map these zones more clearly
	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 of hazardous materials is according to legislation. Recently, the greenkeeping location was renovated and machinery is washed on an impermeable washing floor

		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	All according to legislation
h	l3.2 Safely manage azardous ubstances	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	All according to legislation
n	l3.3 Responsibly nanage waste / torm 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)	All according to legislation; wastewater: oil/grease separated before entering the main sewer

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	The last few years summers were extremely hot and dry. It was decided to irrigate fairways extra using reels. On average, water use for a 9 hole course is low and very acceptable, i.e. ~ 6500 m3 per annum. Surface water is used for irrigation purposes.

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	Regular inspection of the irrigation system is performed by the greenkeeping team. From 2021 onwards irrigation rates for greens/tees/fairways will be measured more accurately
	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	N/A, Kagerzoom does not have its own clubhouse. Club has a contract with a restaurant just next to the course. This party also owns the driving range
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	N/A, surface water is used for irrigation
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	It was discussed that mowing patterns as they are now are optimal for this course and a further reduction is hardly possible, i.e. ~50% of the 23ha is managed as turfgrass
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 analyses its energy bills. The club now analyses possibilities to install solar cells on their facility building
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	
R3 Materials	1	1	
R3.1 Reduce materials demand	R3.1.1 Products and materials selection based on necessity, including	Undertake a review of materials consumed	All products/materials are bought in bulk by the contractor

	opportunities for recycled, reused and locally sourced alternatives		
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	N/A with respect to food etc as the club has no restaurant facilities CIP – consider how the club might work in cooperation with the restaurant business to increase awareness in the community around sustainability issues
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	Waste is separated in paper and a rest stream
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	The club is compliant with all waste management regulations

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 club organizes bird- and plant excursions, which are also open to non-members
C1.2 Provide for volunteering and charity	C1.2.1 Opportunities available for volunteering and support of charities and good causes		Several examples were given during the discussions

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 is close contact with the local community with respect to e.g. safety issues around the course
C2 Golfers & Employees	1		,
C2.1 Improve health and wellbeing	C2.1.1 Benefits to human physical and mental health from golf and facility activities		N/A as the golf school and driving range are not managed/owned by the club. CIP – consider how the club might work in cooperation with the restaurant business to increase awareness in the community around sustainability issues
C2.2 Be open and inclusive	C2.2.1 Inclusivity and diversity in membership and visitor policies	Demonstrate inclusive policies for members and visitors	Membership is open for everybody
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	Only a few people are employed by the club. Driving range, golf school and restaurant are operating independently from the club; the club makes use of these facilities
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	Information on sustainability via link on website, and via local news papers
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	See earlier notes on the restaurant, golf school and driving range

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