

Sustainable Aviation Fuels (SAF) Clearing House

SAF Testing Grants

Guidance document for applicants

Version 1.0

This guidance document provides information on applying to the Department for Transport's SAF Testing Grants, managed by the [UK SAF Clearing House](#). This document should be read in advance of submitting any application and should be referred to throughout the process.

Following a commitment laid out in the UK Government's 2022 [Jet Zero Strategy](#), the UK Sustainable Aviation Fuels (SAF) Clearing House was launched on 17 November 2023 by the Department for Transport (DfT). The SAF Clearing House aims to support the UK's emerging sustainable aviation fuels sector, with the **key objective of the UK SAF Clearing House** being to enable co-ordinated testing and qualification of new sustainable aviation fuels (SAF) against industry standards to broaden availability of fuels to meet UK Government SAF targets and support aviation decarbonisation more widely.

To achieve this objective, the UK SAF Clearing House will offer SAF Testing Grants to allocate up to £5.35 million of grant funding towards the cost of testing to progress a fuel towards qualification against ASTM D7566, the standard regulating the technical approval of SAF, in the period up to 31 March 2025.

The SAF Testing Grants will be offered on a first-come-first-served basis and allocated for each individual application via a 2-stage process:

Stage 1 – Eligibility assessment

Stage 2 – Grant application

Grants will be awarded until the budget is fully utilised – see **Section B** for a full explanation of the competition scope.

The UK SAF Clearing House and SAF Testing Grants will be administered and managed on behalf of the DfT by delivery partner the University of Sheffield, supported by Ricardo Energy & Environment.

SAF Testing Grants are open to applications until 1 September 2024. Application documents are available on the UK SAF Clearing House [website](#). Additional resources, including a short video on how to apply for funding are also available on the website.



Those interested in SAF Testing Grants should register interest by emailing Info@safclearinghouse.uk to ensure you are kept up to date as the scheme progresses.

This guidance document has three sections (it is vital to read and understand all sections ahead of an application):

- **Section A** - The fund background.
- **Section B** - Fund objectives and eligibility criteria.
- **Section C** - Guidance for applicants.

Please see the website for supplementary information, such as anonymised questions and responses that will be published on a regularly updated FAQ page. If applicants have any questions about these guidelines, they should send these to Info@safclearinghouse.uk.



SECTION A: THE FUND BACKGROUND

This section sets out the background to the SAF Testing Grants, and the rationale for this new initiative.

Background

The UK has challenging goals for reducing greenhouse gas (GHG) emissions. In transport, the electrification of vehicles will have a key role, but the aviation sector currently has few alternatives to using liquid fossil fuels. Biofuels derived from wastes and residues, fuels made from renewable or nuclear electricity and waste-based fossil fuels could deliver significant GHG savings. However, other than commercially mature hydrotreating routes using segregated waste oils and fats, these conversion routes are yet to be commercialised and face high upfront capital costs and investment barriers which are challenging to overcome without government intervention.

In the UK, DfT have encouraged the deployment of waste/residue-derived biofuels and renewable fuels of non-biological origin through double counting under the Renewable Transport Fuel Obligation (RTFO), and inclusion of aviation fuels within the RTFO 'development fuels' sub-target. DfT have also previously made available grant funding to industry projects via the £25 million [Advanced Biofuel Demonstration Competition](#) (ABDC), the £20 million [Future Fuels for Flight and Freight Competition](#) (F4C), the £15 million [Green Fuels, Green Skies \(GFGS\) Competition](#) and the £165 million [Advanced Fuels Fund](#). Whilst these demand-side and supply-side policy approaches have been successful at helping build innovative biofuel demonstration projects and designing a number of SAF projects, there is still an ongoing need to support the development of the emerging UK sustainable aviation fuel sector as it scales up to commercial production.

In the Jet Zero Strategy, the government committed to establishing a UK Clearing House to enable fuel testing and qualification for SAF. The Clearing House is intended to help reduce uncertainty, cost, and time barriers to SAF development to help broaden the scope of fuels eligible for the future UK SAF mandate without sacrificing safety. In March 2023, the University of Sheffield was appointed as the delivery partner for the Clearing House to help set up and run the Clearing House function, supported by Ricardo. The Clearing House will act as a central hub to advise fuel producers, coordinate testing, liaise with key stakeholders and manage applications for grant support.

DfT will offer SAF Testing Grants which will allocate grant funding towards the cost of testing to progress a fuel towards qualification against ASTM D7566 up to a total budget of £5.35 million. Grants will correspond to a defined stage of testing, based on ASTM D4054, a



standard practice intended to guide a defined evaluation process for new aviation fuels and fuel additives. In support of this, the UK SAF Clearing House will offer tailored advice to support all potential applicants regarding the ASTM qualification process.

To ensure the SAF Testing Grants achieve the stated objectives, it is necessary to clearly define the scope of the fund and provide the criteria used to assess the eligibility of proposed projects. This is discussed in **Section B**.

SECTION B: FUND OBJECTIVES AND ELIGIBILITY CRITERIA

This section provides an outline of the SAF Testing Grants, eligibility criteria, and requirements.

Overview

The purpose of the grant is to support the development of the emerging UK sustainable aviation fuel sector as it introduces new fuels to the market. The costs involved with pre-screening testing and testing to progress a fuel towards qualification against industry standards could be prohibitive to the broader development of new fuels, leading to the offer from DfT to part-fund these costs.

In total, up to £5.35 million in grant funding will be provided to applicants that meet the selection criteria during the Funding Period (17 November 2023 – 31 March 2025).

Objectives

The **key objectives of the SAF Testing Grants** are to:

- Support the development, evaluation and qualification of SAF from a range of new sustainable sources and thereby support the increased deployment of SAF eligible to qualify for the future UK SAF mandate.
- Broaden and strengthen the pipeline of UK SAF.
- Support the advancement of a diverse range of technology routes to SAF.

The **objectives for applicants** receiving financial support are:

- **Fuel production:** material progress towards developing an eligible fuel, with high process maturity and performance for the purposes of attaining qualification.
- **Commercial potential:** develop a strategy for commercialising the fuel once qualified, evidencing the potential for value to the UK.
- **Emissions reduction:** Where possible, demonstrate a minimum carbon intensity reduction compared to fossil derived kerosene of 40%.
- **Project execution:** bring together a team with the necessary expertise and experience to deliver the project according to its objectives.
- **Investor confidence:** catalyse private investment or attract new investors into the project and reduce investment risks.



Department for Transport

Eligibility Criteria

In order to be eligible to apply for a SAF Testing Grant, an applicant must comply with the following minimum requirements. These will be assessed via a Stage 1 application (Eligibility Assessment). **Applicants may only move into Stage 2 (Grant Application) upon passing Stage 1:**

Category	Eligibility Criteria
Fuel type	The fuel must have the potential for use as a synthetic blend component for aviation turbine fuel as defined by ASTM D7566 and/or feedstock for coprocessing within ASTM D1655.
Feedstocks	<p>Feedstock eligibility is largely based on current guidance for the Renewable Transport Fuel Obligation (RTFO) and anticipated eligibility under the future UK SAF mandate (excluding segregated oils and fats) which is due to come into operation from 2025. Eligibility rules vary according to the feedstock type used:</p> <ul style="list-style-type: none">• Biomass feedstocks (including the original feedstocks used to derive any intermediate fuels) should have the potential to qualify as a double-counting development fuel feedstock under the RTFO – i.e. be a sustainable biomass waste or residue (excluding segregated oils/fats)¹. Waste biomass feedstocks, such as the biogenic fraction of Refuse Derived Fuel (RDF)², must demonstrate compliance with the RTFO definition of a waste³, and must be a waste that cannot be prevented, reused, or recycled – in accordance with the waste hierarchy⁴.• The following recycled carbon fuel (RCF) feedstocks are permitted:<ul style="list-style-type: none">○ The fossil component of RDF from the mechanical treatment of municipal solid waste streams.○ Industrial waste process gases containing carbon monoxide, that are only suitable for incineration for energy recovery.

¹ The current status of many feedstocks can be found in RTFO list [here](#). Please note that all single counting feedstocks, used cooking oil, tallow, other segregated fats/oils and dedicated energy crops are **not** eligible feedstocks for producing development fuels. Applicants that are uncertain of the eligibility of their feedstocks should direct questions to Info@safclearinghouse.uk.

² Or Municipal Solid Waste or Commercial & Industrial waste that is converted into RDF onsite, before fuel production.

³ As per the RTFO Order: 'waste' means any substance or object which the holder discards, or intends or is required to discard, but does not include any substance or object that has been intentionally modified or contaminated for the purpose of transforming it into a waste.

⁴ i.e. not taking feedstock supplies from existing more environmentally beneficial uses. This requires consideration of how the waste material could not have been prevented, re-used or recycled, and hence the only alternatives available are energy recovery or disposal. Guidance on the waste hierarchy can be found here: [Waste hierarchy guidance \(publishing.service.gov.uk\)](#)



Department for Transport

	<p>Any further RCF feedstocks which are assessed and deemed eligible by the RTFO Unit in the future will also be eligible under the Clearing House, with the criteria to be updated accordingly.</p> <ul style="list-style-type: none">• Energy as a feedstock must meet the eligibility rules as set out in the RTFO Guidance for Renewable Fuels of Non-Biological Origin. This includes requirements for electricity, heat, hydrogen and nuclear energy. <p>These feedstock eligibility requirements will be updated in line with any relevant policy developments. SAF Testing Grants are not subject to any additionality requirements for renewable or nuclear energy at present.</p>
Project Lead	The project lead must be a UK registered company or charity with a UK footprint. The project lead must supply a UK company registration number.
T&Cs	Applicants must accept the grant offer letter and the grant agreement terms and conditions in full at the application stage. Further negotiation is not possible. ⁵
Fuel testing stage	The project must not have commenced testing of the fuel for the testing stage they are applying for support with. For example, if contracts have already been entered into for Tier 1 targeted testing with a test house, and/or work has commenced, the applicant cannot retrospectively apply for funding.
Eligible costs and grant intensity	Funding cannot be used for previously funded activities or to replace private sector investment. ⁶ The maximum grant funding intensity is 80% although this will vary based on the stage of testing.
Timescales	Funding is only available for eligible project work completed during the Funding Period (to 31 March 2025). ⁷

Questions and points of clarification

Questions and points of clarification about the SAF Testing Grants should be emailed to Info@safclearinghouse.uk. Anonymised questions and responses will be published on a regularly updated FAQ page, available on the [website](#).

Eligibility queries will be responded to promptly, but the final decision as to eligibility of a project resides with the DfT Fund Board and can only be confirmed upon submission of a full application and completion of the assessment process set out in **Section C** below. Note that a project being deemed eligible for a SAF Testing Grant is no guarantee of eligibility for the RTFO or any future UK SAF mandate.

⁵ An example grant offer letter is available via the SAF Clearing House [website](#).

⁶ Please refer to “Interaction with other funding schemes” in Section C of the guidance document for further information.

⁷ Please refer to “Fund scope and Funding Period” in Section C of the guidance document for further information.

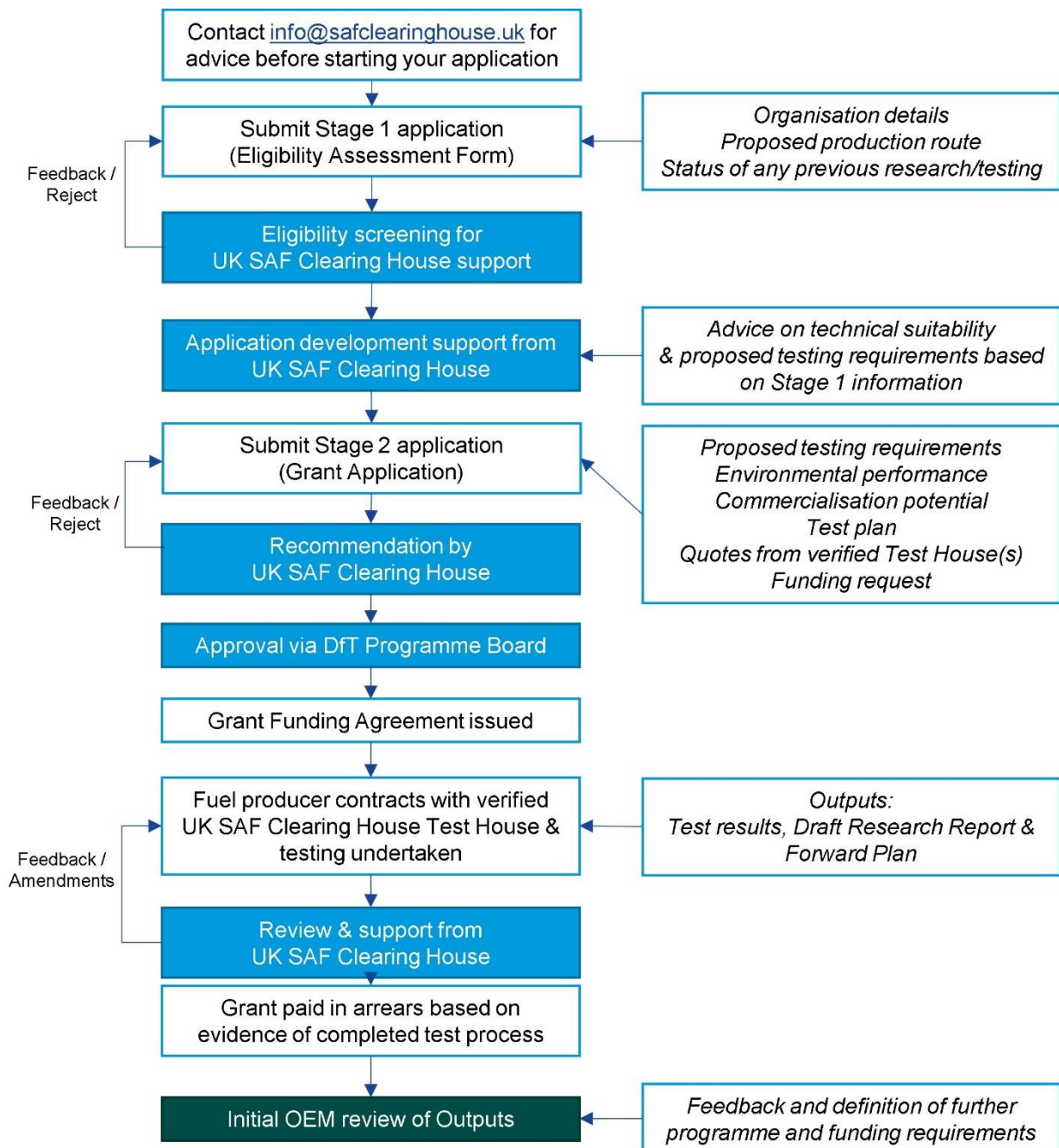
SECTION C: GUIDANCE FOR APPLICANTS

This section sets out the processes and actions for applicants.

Overview and Timetable

The following figure outlines the funding process.

Figure 1: SAF Testing Grant process



Who is managing the SAF Testing Grants process?

The UK SAF Clearing House and SAF Testing Grants will be administered and managed on behalf of DfT by the delivery partners the University of Sheffield and Ricardo Energy & Environment. DfT retains overall responsibility for the execution, eligibility, and award decisions, grant terms and payments throughout.

Who can apply for funding?

Applications are expected primarily from private sector commercial organisations, with a range of project partners permissible, including SMEs⁸ and academic institutions. Applications can be made by a single organisation or via a consortium/partnership with a project lead organisation that receives funds and signs up to the grant conditions. The lead applicant organisation must be registered in the UK (see eligibility criteria in Section B).

Those interested in the SAF Testing Grants should register interest by emailing Info@safclearinghouse.uk to ensure you are kept up to date as the scheme progresses. Application documents will be made available on the UK SAF Clearing House [website](#) on 17 November 2023.

Scope and Funding Period

Funding will be available for work completed within the duration of the programme only. This will begin following the opening of the assessment process on 17 November 2023 and runs until 31 March 2025. Applications will close on 1 September 2024 to ensure any funded activity has time to complete ahead of the end of the programme in March 2025. Applications will only be accepted to support eligible costs for pre-screening testing and testing to progress a fuel towards qualification against ASTM D7566.

The Funding Period for successful projects will begin after the signing of the grant agreement and other relevant paperwork. The start and end date of the Funding Period will be specified in the grant agreement. Projects should not commit themselves to any expenditure on which grant funding may be sought until after a decision has been made on your application. If a grant offer letter is sent to you, you should sign and return it, and receive a countersigned copy from DfT before incurring costs. DfT will not give grant funding to cover incurred costs that have started before a grant offer letter has been signed, including costs incurred in developing an application.

All grant recipients will need to have completed the funded activity by 31 March 2025 for the spend to be eligible. The DfT reserves the right to ask that activity is complete before this date,

⁸ An SME is any organisation that has fewer than 250 employees and a turnover of less than €50 million or a balance sheet total less than €43 million. <https://www.gov.uk/government/publications/fcd0-small-to-medium-sized-enterprise-sme-action-plan/small-to-medium-sized-enterprise-sme-action-plan#what-is-an-sme>

to allow time for final claims to be processed. Any change in the final cut-off date for eligible activity will be communicated at least 3 months in advance.

Eligible activities and costs

Please see Appendix B of this guide for a full list of eligible and ineligible costs. The fund will provide up to 80% grant funding for the cost of pre-screening testing and testing to progress a fuel towards qualification against ASTM D7566. The fund will not provide funding for fuel production costs, purchase of feedstocks, project management or other overheads.

Please contact the delivery partners if you have any questions regarding the eligibility of your project: Info@safclearinghouse.uk. Anonymised questions and responses will be published on a regularly updated FAQ page, available on the [website](#).

What documentation is required for an application?

Applications must be completed using the application form available on the [website](#). We will not consider applications submitted in any other format.

Please ensure that you follow the guidance within the application form regarding formatting and number of words per section. When doing so, please refer to this guidance document where necessary and ensure that you have complied with all the scheme requirements. Please also ensure that when asked to provide any additional information, if applicable, please do so in a clear and concise manner by submitting this information as an Annex.

Stage 1: Eligibility Assessment

- Outline details of planned fuel pathway and feedstocks
- Details of fuel development progress made to date, including any previous testing and interaction with OEMs
- An understanding of where the UK SAF Clearing House might help support next steps and provide advice on appropriate test requirements
- Confirmation of company details & eligibility criteria

Stage 2: Grant Application

- Any update on information provided in the Stage 1 form
- Proposed testing requirements and evidence to support the appropriateness of the tests
- Consideration of potential commercialisation pathways and IP
- Letters from any proposed partners confirming that they have agreed to be part of the consortium/alliance/partnership that will implement this project.
- An outline project risk assessment (template provided)
- A summary of the overall work plan
- A detailed project budget for the grant funded activities

- Details of any match funding from project financiers (where relevant)
- Relevant documentation to enable the completion of due diligence on the applicant(s).

All completed application forms and required attachments must be submitted electronically to Info@safclearinghouse.uk.

Applications will be logged and an acknowledgement email will be issued providing a unique reference number for your application within two working days of the application date. This reference number should be used in all communications with the delivery partner about your application.

Please note that during the assessment period, you must be able to provide (within reasonable timescales) on request further evidence and clarifications materially connected to your application's assessment or needed to support due diligence undertaken by DfT. Please ensure that this information is readily available to avoid delay to grant award and enable commencement of funded activities. The funding period will not be extended should there be delays to this process.

Assessment of applications

Stage 1 applications will be screened against the eligibility criteria provided in Section B and reviewed from a technical perspective to understand the status and needs of the applicant. Applications that pass the eligibility criteria screening will then be invited to prepare and submit a Stage 2 application. During the preparation of the Grant application the UK SAF Clearing House will provide support (where appropriate) advice and recommendations regarding all aspects of the evaluation programme including:

- The potential technical suitability of the proposed product,
- Type of optimisation if required,
- Evaluation/testing required and where it may be carried out, and,
- Forward planning of industry processes and protocols, and engagement with stakeholder groups.

Once formally submitted, development support from the UK SAF Clearing House team will end, and Stage 2 applications will be assessed by at least two independent experts from the Ricardo team against the scoring criteria provided below, and feedback given on any points of improvement. Applications that have been supported by the UK SAF Clearing House in their preparation, particularly in identifying the most appropriate testing requirements, are less likely to need further iteration. Engagement with the UK SAF Clearing House regarding an application's formal submission will be limited to clarification questions where required, until such time as a decision has been reached on providing funding.

Grant applications will be subject to a due diligence assessment and final approval by DfT.

All applications are subject to assessment, and the assessment of applications will be based only on the information which is explicitly contained within your application and supporting documentation, or that is provided during clarification. You must not assume that the assessment team has any prior knowledge of your organisation or its work.

Table 2: Scoring criteria

Scoring of applications

Category	Scoring criteria
Technical suitability (50%)	1. Credibility of the technological approach, clarity of the project data and justification with relevant prior research data
	2. Level of progression towards and/or through the ASTM certification process
	3. Appropriateness of proposed testing requirements
	4. Technical Risk Assessment of the process and product
Environmental performance (10%)	4. Expected carbon intensity reduction when compared to fossil kerosene
Commercialisation potential (10%)	5. Credibility of proposed commercial production pathway & engagement with relevant stakeholders (e.g. OEMs)
	6. Potential and case for benefits of future deployment of the fuel within the UK, and benefits from UK IP
Delivery Plan (30%)	7. Credibility of current status of the project and readiness to proceed with funded activities
	8. Confidence in skills and experience of the project team
	9. Appropriateness of project management and governance structure
	10. Appropriateness and credibility of the project work plan
	11. Detailed understanding of the project risks and their management
	12. Strength of case for DfT funding, including status of securing matched funding

The total score awarded to an application in the scoring process will be calculated by applying a weighting to each of the scoring criterion given in Table 2 below. These scoring criteria will be assessed using the information you provide in your application form.

In order to be eligible for consideration for funding, projects that have met the eligibility criteria must score a minimum total weighted score of 65% in the Stage 2 scoring process.

In addition, higher marks are available to projects able to offer evidence of higher proportions of **match funding** secured during the Funding Period. However, DfT reserves the right to fund projects at up to 80% of total costs of eligible work where appropriate and where compliant with subsidy control requirements.

Funding allocation

The £5.35 million of total grant funding available is split across two Funding Years:

- Funding Year 1 = until 31 March 2024. Up to £2.35 million grant funding available
- Funding Year 2 = 1 April 2024 – 31 March 2025. Up to £3m million grant funding available

The split of available funding across two Funding Years means that some projects might e.g. apply and receive funding for Tier 1 targeted testing costs within one Funding Year and then apply and receive funding for Tier 2 targeted testing costs within the second Funding Year. To allow for the appropriate timescales for testing at each Tier, the final date for applications is 1 September 2024 to ensure all costs are fully accounted for and grant claims submitted before 31 March 2025.

Applicants must demonstrate how funds requested will be appropriately used by 31 March 2025 within their Stage 2 application.

Applicants should note that nothing in this guidance document commits DfT to award any applicant a grant offer either at all or of any particular amount or on any particular terms. DfT reserves the right not to award any grant offers, in particular if DfT is not satisfied by the quality of proposals received or if the funding assigned to the scheme is reallocated to other purposes. DfT will not, under any circumstances, make any contribution to the costs of preparing proposals and applicants accept the risk that they may not be awarded any funding, or the amount of funding requested.

The DfT Programme Board will provide a letter with brief reasons for its decisions to any applicant that it decides not to fund. All decisions made by DfT are final.

Maximum funding intensity

DfT has set the maximum grant funding intensity at 80%, for pre-screening activity, Tier 1 and 2 testing, and 50% for Tier 3 and 4. Eligible costs are set out in detail in Appendix B. Proposals that include higher match funding will be scored preferentially, with increased match funding able to score higher marks. All applications for funding are subject to assessment and there is no guarantee that successful applicants will be offered the full amount they have applied for.

Maximum and minimum awards

While there is no maximum award limit per project, the total grant funding available is £5.35 million. There is also no guarantee that the full £5.35 million will be awarded. There is no minimum award threshold per project.

Interaction with other funding schemes

Grant schemes: It is possible to apply or to have applied for other grant scheme funding so long as Subsidy Control rules are not breached. This may mean a single eligible project applies for grants from two or more schemes up to the maximum subsidy control intensity, or that grants are applied to different elements of a project (e.g. electrolysis, CO₂ capture), so long as the base eligible costs do not overlap. In particular, projects previously or currently being supported under Innovate UK or KTN Sustainable Aviation Fuels research grants are required to demonstrate how funding through the SAF Testing Grants will directly support different work even if for the same fuel development project.

Loan schemes: Applicants that have received loans from other schemes remain eligible for SAF Testing Grants as long as the loans received were provided on a commercial basis (i.e. including an appropriate rate of interest).

Due Diligence

For all valid applications, the applicants and each partner in any consortium may be subject to due diligence and must provide all information required in the fund application form to facilitate this process, plus any additional information requested during the assessment period. Due diligence may also be carried out on sources of match funding (where appropriate). Applications from any organisation failing these tests (including failure to provide requested information within the time frame requested) or involving a consortium that includes any organisation failing these tests, may be ruled ineligible.

Approval of applications

If your application for funding is successful, you will receive a grant offer letter. This offer may be subject to conditions that need to be met. The grant offer letter, including the terms and conditions of grant, form the agreement between your organisation and DfT. You must sign the offer letter and return it to establish the agreement. Applicants should review the example

grant offer letter and grant agreement, as this will set out the terms and conditions that DfT will require successful applicants to sign up to.

Grant payments

The draft grant offer letter sets out all terms of the funding and the duties and responsibilities of both parties. DfT will only release evidence-based funds after signing of the grant offer letter. Grantees must follow the conditions in their agreements on release and use of funds. Applicants must also satisfy the due diligence, financial and organisational checks required prior to receiving public funds.

DfT recognises the importance of remaining flexible and pragmatic throughout project implementation and will consider changes to ensure the most effective use of funds. DfT should be requested to approve any changes to the overall impact and outcome of projects and any significant changes in outputs. Requesting a significant change may necessitate a re-examination of project purpose or implementation. An updated work plan and budget may also be needed when requesting changes.

Where circumstances outside the control of grantees occur that impact on delivery of the expected outputs in a given funding year, grantees must inform the delivery partner managing the grant on behalf of DfT as soon as possible.

Funds should be claimed in arrears against evidence of expenditure which will usually take the form of receipted invoice(s) from the test facility(s), accompanied by evidence of the fuel testing undertaken e.g. outputs, reports. Should this not be possible, by exception you may submit evidence of lack of funds and the payment may be able to be made in advance with DfT's written agreement. In the event of an advanced payment, any unspent funds must be repaid in full. A claim form will be issued with your grant offer letter. Once the fuel testing is completed to the satisfaction of the project team, you will be expected to complete and submit a claim form. You will need to provide a statement of expenditure which evidences costs incurred, which can be verified by the facility that carried out the testing activity. Claims are submitted to the Fund delivery partner for processing. Claims will be processed within 21 working days of any claim being received by the Fund delivery partner. Finance is released against work carried out rather than a lump sum on approval.

Reporting

Each winning project will be provided a Monitoring Officer from the SAF Clearing House delivery partner team. The grantee must maintain regular communication with their nominated Monitoring Officer.

The winning projects will be required to provide updates on the project progress including:

- Agreeing to a monthly progress call with their Monitoring Officer.
- A final financial and narrative report within 15 days of the end of the project.

The University of Sheffield and Ricardo Energy & Environment, who manage the UK SAF Clearing House and SAF Testing Grants on behalf of DfT, will review all reports and will address any issues in these and contact grantees accordingly. They will be the first point of contact between grantees for any project reporting.

Reporting beyond project completion

It is expected that projects awarded a grant may be subject to future independent evaluation of their project as part of a wider UK SAF Clearing House evaluation. This may be carried out by a third party on behalf of DfT and grantees will be required to participate.

Intellectual property rights

IP developed within the project remains the property of the applicant/consortium. Any information provided to DfT may be subject to the Freedom of Information Act 2000, the Environmental Information Regulations 2004 or other legislation. DfT will work with applicants to ensure that no commercially sensitive information is disclosed as far as possible under the law.

APPENDIX A: Currently certified ASTM SAF pathways, and those in the qualification process

Note that not all these pathways will be eligible for SAF Testing Grants – feedstock, GHG emission and other eligibility requirements apply. Additional pathways will also be considered.

ASTM Abbreviation	ASTM Description	Certification Status
FT-SPK	Fischer-Tropsch - Synthetic paraffinic kerosene	Certified
FT-SPK/A	Fischer-Tropsch - Synthetic paraffinic kerosene with added aromatics	Certified
HEFA-SPK	Hydroprocessed Esters & Fatty Acids - Synthetic paraffinic kerosene	Certified
HFS-SIP	Hydroprocessing of Fermented Sugars - Synthetic Iso-Paraffinic fuels	Certified
ATJ-SPK	Alcohol-to-Jet Synthetic Paraffinic Kerosene	Certified
CHJ	Catalytic Hydrothermolysis Synthesized Kerosene	Certified
HC-HEFA-SPK	Hydrocarbon-hydroprocessed Esters and Fatty acids	Certified
	Co-processing of up to 5 vol% FT waxes from MSW	Certified
	Co-processing of up to 5 vol% oils and fats in a refinery to produce kerosene	Certified
HDO-SAK	Hydro-deoxygenation Synthetic Aromatic Kerosene	Assessment
HFP HEFA-SK	High Freeze Point Hydroprocessed Esters and Fatty Acids Synthetic Kerosene	Assessment
IH ²	Integrated Hydrolysis and Hydroconversion	Assessment
ATJ-SKA	Alcohol-to-Jet Synthetic Kerosene with Aromatics	Assessment
ATJ	Alcohol-to-Jet	Assessment

Source: http://www.caafi.org/focus_areas/fuel_qualification.html

APPENDIX B: Eligible and Ineligible Project Work

DfT has set the maximum grant funding intensity at 80%, for pre-screening activity, Tier 1 and 2, and 50% for Tier 3 and 4 to progress a fuel towards qualification against ASTM D7566.

Eligible activities and costs

- Test facility costs for approved test requirements (at test facilities recognised by the UK SAF CH)
- Logistics and equipment costs for transporting samples to test houses, for pre-screening, Tier 1 and Tier 2 testing **only**.

Ineligible activities and costs

- Any costs incurred before a grant offer letter has been signed with DfT, or after 31 March 2025
- Any cost incurred for production of the fuel. This includes own or subcontractor labour, overhead and operating costs
- Costs incurred in developing an application for a SAF Testing Grant
- Project management costs
- Input VAT (except where it cannot be reclaimed by grantees)
- Interest charges, bad debts
- Hire purchase interest and any associated service charges
- Loan repayments
- Mark up and profits
- Notional costs (e.g. opportunity costs)
- Grants that contribute directly to a company's distributed profits
- Endowments
- Funds to build up a reserve or surplus
- Retrospective funding
- Any costs that are already being funded by another grant source, or are to be funded by another grant source in the future
- Advertising, marketing, sales activities, entertaining

APPENDIX E: GHG emissions for Recycled Carbon Fuels

GHG emissions calculation methodology

For the purposes of the SAF Testing Grants, the GHG emissions associated with RCFs should be calculated following the methodology outlined in Box 1. This methodology does not indicate any confirmed policy position as to RCF GHG emissions under either the RTFO or SAF mandate.

Box 1: RCFs GHG emissions methodology

Under the counterfactual methodology, the GHG emissions from the production and use of RCFs, E , is calculated as:

$$E = E_{\text{prod}} + E_{\text{td}} + E_{\text{disp}} - E_{\text{CCS}}$$

Where:

E = total emissions from the use of the fuel (gCO₂e/MJ LHV)

E_{prod} = emissions from production and processing (gCO₂e/MJ LHV)

E_{td} = emissions from transport and distribution (gCO₂e/MJ LHV)

E_{disp} = emissions from displaced energy use (gCO₂e/MJ LHV)

E_{CCS} = emission saving from carbon capture and geological storage (gCO₂e/MJ LHV)

And

$$E_{\text{disp}} = \frac{Ef_e \times E_e}{Ef_{\text{RCF}}}$$

Where:

Ef_e = Efficiency of conversion in counterfactual use (%)

E_e = Emission factor of the displaced energy in counterfactual (gCO₂e/MJ LHV)

Ef_{RCF} = Efficiency of conversion to RCF (%)

Further details on how to follow the GHG methodology are as follows:

1. Emissions from production and processing, E_{prod} , include emissions from the production and processing itself; from waste and leakages; and from the production of chemicals or products used in processing.
2. Emissions from transport and distribution, E_{td} , includes emissions from the transport and storage of raw and semi-finished materials, wastes and leakages, and from the storage and distribution of finished materials.
3. Emission saving from carbon capture and geological storage, E_{CCS} , that have not already been accounted for in E_{prod} , shall be limited to emissions avoided through the capture and sequestration of emitted CO₂ directly related to the transport, processing and distribution of fuel. The capture of any CO₂ at the start of the fuel chain, i.e. the collection of raw materials used to manufacture the assessed fuel, cannot be included within this E_{CCS} emission saving – nor can any recycling of captured CO₂ within the fuel chain – as these are not sequestration activities.
4. Emissions from displaced energy use, E_{disp} , shall be assumed to be from an EfW (electricity only) plant where E_{f} is assumed to be 22%. E_{e} should be taken to be the relevant average grid intensity figure for the country and year in question (forecast UK grid intensities are given below). E_{fRCF} should be determined from the yield of fuel per unit of feedstock calculated on an energy basis. Suppliers of RCFs produced from industrial gases are required to demonstrate that heat generation is not displaced by the production of RCFs. If there is evidence that increased heating requirements arise due to the production of RCFs then heat generation is considered to be the counterfactual use.
5. Where an RCF production plant produces multiple coproducts (including excess heat or electricity that is exported and utilised), allocation by energy content should be undertaken, consistent with the current RTFO GHG methodology for biofuels. The factors to be allocated would be E_{disp} and those fractions of E_{prod} , E_{td} and E_{CCS} that take place up to and including the process step at which a co-product is produced.

UK grid intensity figures

The following forecast GHG emissions trajectory is from the Treasury Green Book, offset by 3 years to reflect the delay in updating official BEIS figures (since a plant starting full operations in January 2027 would be using data corresponding to the 2024 UK grid factor). If UK grid electricity is the displaced energy in the RCF counterfactual, then the data in this table is to be used directly to derive the E_{e} factor – e.g. if your plant is due to start full operations in 2027, read off the 2027 value for E_{e} .

First full year of operations	UK grid electricity intensity used for reporting in that year (gCO _{2e} /MJ _e)
2024	40.54
2025	37.88
2026	36.33
2027	39.64
2028	33.53
2029	24.72
2030	20.46
2031	18.92
2032	17.71
2033	14.06
2034	11.13
2035	9.62
2036	8.36
2037	7.59
2038	6.77

GHG emissions threshold

Based on the first full year of operations given in your application, the corresponding GHG emission threshold value in the table below is to be used to calculate whether the recycled carbon fuel (RCF) consignments produced from a commercial scale plant will be eligible under the SAF Testing Grants.

These values do not indicate any confirmed policy position as to RCF GHG emissions thresholds for either the RTFO or SAF mandate. Furthermore, eligibility for the SAF Testing Grants does not determine eligibility for the RTFO or SAF mandate, in either the first year of operations or any other given year, given operational emissions can vary from projected designs and can vary across years.



Department for Transport

First full year of operations for a commercial plant	RCF lifecycle GHG emissions threshold (gCO ₂ e/MJ _{LHV})
2024	41.3
2025	40.2
2026	39.5
2027	40.9
2028	38.3
2029	34.4
2030	32.5
2031	31.8
2032	31.3
2033	29.7
2034	28.4
2035	27.7
2036	27.2
2037	26.8
2038	26.5

These threshold values do not apply to biofuel, RFNBO or nuclear consignments produced from FOAK commercial plants, which are being assessed under the SAF Testing Grants against a fixed threshold of 31 gCO₂e/MJ_{LHV}.