FOREST CERTIFICATION PROTOCOL

ENTITIES & PROJECTS

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Forest Certification Protocol: Entities and Projects
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Forest Certification Protocol: Entities & Projects

Part I: Introduction & Key Certification Concepts

Overview

The Forest Certification Protocol (FCP) is an appendix to the General Certification Protocol. It is designed to provide approved forest certifiers with clear directions for how to execute a standardized review and assessment of the carbon (C) stocks and greenhouse gas (GHG) emissions associated with a forest entity's biological inventory, including forest projects.

The intended audience for this Appendix is State- and Registry-approved forest certifiers. However, forest entities may also find it useful to review this Appendix to develop a better understanding of the certification activities associated with forest sector reporting in the California Climate Action Registry (Registry).

NOTE: *Only State- and Registry- approved forest certifiers (which must include a Registered Professional Forester) are eligible to certify forest biological inventory of entities and projects. It is important to note that State and Registry approved certifiers under the Registry's General Reporting Protocol are NOT automatically approved to certify forest activities. To become an approved forest sector certifier, a general certifier must successfully complete a forest sector-specific application process. See Part II.*

This Appendix is organized into six parts as described below:

Part I:	Introduction & Key Certification Concepts
Part II:	Approved Forest Certifiers
Part III:	The Certification Process
Part IV:	Conducting Core Certification Activities
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Forest Certification Protocol vs. General Certification Protocol

All forest entities must report their biological inventory and non-biological emissions for their entity on an annual basis. Biological inventory refers to reported biological forest carbon stocks and their associated CO_2 emissions. The Forest Sector Protocol (FSP) is the Registry's standard for how forest entities must report their entity-wide biological inventory. In addition, the Registry's Forest Project Protocol (FPP) serves as the standard for how a forest entity must report its forest project activities and inventory. The General Reporting Protocol serves as the standard for how forest (and other) entities must report their non-biological emissions.

This Forest Certification Protocol provides directions for how you (the certifier) should review and certify a forest entity's biological inventory, including any forest projects they may choose to report. To successfully complete the certification of a forest entity (and its projects), you must use the General Certification Protocol to certify the forest entity's non-biological emissions and this Appendix to certify the biological inventory of their entity and projects.

Given that forest entities must report and certify both their biological and non-biological GHG inventories, all approved forest sector certifiers must read and be familiar with the following Registry documents at a minimum:

- General Reporting Protocol

- General Certification Protocol
- Forest Sector Protocol
- Forest Project Protocol
- Forest Certification Protocol: Entities & Projects

The Registry's protocols are all available on its website: www.climateregistry.org/protocols. If you have difficulty accessing any of the documents, please call 213-891-1444.

Protocol Questions

The Registry's reporting and certification protocols are designed to be compatible with one another. Should you encounter a conflict between any of the documents, or if you have questions about carrying out the steps described herein, please contact the Registry at: 213-891-1444.

Protocol Comments and Continual Program Improvement

The Registry welcomes and encourages Registry members, certifiers, technical assistants, and the public to comment on its protocols, program, quality, and usefulness of data at any time. The Registry values all feedback on how to improve and develop its program.

If you have a comment or suggestion that you would like to formally submit to the Registry for consideration, please complete a Protocol Comment Form, available at www.climateregistry.org/Protocols. The Registry will post your comments on its website for public review and response.

The Registry may update the FSP, FPP, and the FCP occasionally to reflect new scientific findings or policy direction. The Registry will notify all forest entities and approved forest sector certifiers when it updates any of the aforementioned documents.

The current versions of all protocols pertaining to forest entities and projects will be available on the Registry's website: www.climateregistry.org/PROTOCOLS/FP/

Key Certification Concepts

Forest Certification Activities

Certification of a forest entity's biological inventory consists of reviewing and assessing all inventory systems, at a minimum, in years 1 and 6 of the six-year forest certification cycle. The goal of certification is to confirm that a forest entity (or project) has:

1. Properly identified the Registry's required carbon pools (refer to the Forest Sector Protocol Glossary for a definition of carbon pools),
2. Implemented appropriate management systems and inventory methodologies to manage and measure the required carbon pools,
3. Carried out its carbon measurement calculations and projections accurately, and
4. Certify any emission reductions that may have occurred.

Standard for Certification

The Registry's standards for forest certification are its Forest Sector and Project Protocols. The FSP and FPP contain the Registry's required GHG and carbon (C) calculations, reporting, and monitoring activities, and are the basis for evaluating whether a forest entity's reported GHG emissions and/or reductions are accurate. You should only apply the standards described in the FSP and this FCP when assessing a participant's Annual GHG Report.

Minimum Quality Standard

For a forest entity's annual entity or project biological inventory to be certifiable, it must be free of material misstatements. A material misstatement must be declared if the reported forest inventory does not appropriately describe the forest area and differs greatly from your own assessment of the inventory, changes in stocks, and emissions reductions estimates as described in more detail later in this document.

To meet the Registry's minimum quality standard, the forest entity's calculations on a randomly chosen subset of plots must be within 15% of your calculation. In addition, actual C measurements must be within 10% of projected estimates, and the overall inventory and management systems must meet the Registry's criteria as well as your professional judgment to be certifiable.

The quality of an inventory should be determined by the forest certifier using the step by step process outlined later in this document in Table 2. In addition to confirming the validity of the reported C stocks and emissions reductions, Table 2 helps you review and assess the reasonableness of a biological entity or project inventory.

NOTE: *The threshold for material misstatements differs for biological inventories and non-biological emissions. Refer to the General Certification Protocol for a definition of a material misstatement of non-biological emissions.*

Reporting Uncertainty vs. Inherent Uncertainty

Reporting uncertainty is the level of uncertainty associated with a forest entity's chosen C stock sampling and calculation methodologies. *Inherent uncertainty* refers to the scientific uncertainty associated with calculating C stocks and GHG emissions.

The Registry is aware that there is inherent scientific uncertainty in quantifying C stocks of forest entities. However, determining scientific accuracy is not the focus of the Registry. Instead, the Registry's certification process is designed to identify and assess reporting uncertainty. Therefore, when assessing if a forest entity's entity or project biological inventory meets the Registry's minimum quality standard, you should only consider quantification differences that result from reporting uncertainty, not inherent uncertainty.

De Minimis Emissions

While the Registry's General Reporting Protocol allows for the exclusion of up to 5% of "de minimis" emissions for non-biological reporters, there is NOT a de minimis threshold for biological inventories associated with forest entities and forest projects.

In the first three years of reporting, forest entities must report 100% of their biological CO_2 emissions, which for the entity result from changes in C stocks and for any projects include the required C pools. Starting in year 4, forest entities must report all of the relevant Kyoto gases (CO_2, CH_4, N_20, HFCs, PFCs, and SF_6).

NOTE: *The Registry's current guidance only covers emissions associated to CO_2. Additional guidance will need to be developed for the other Kyoto gases that occur in relation to forest entities and projects.*

Part II: Approved Forest Certifiers

Becoming an Approved Forest Certifier

Certification firms must be approved by the State and Registry before they are eligible to conduct any certification activities for Registry participants. The State of California and the Registry will "approve" certifiers that are qualified to review a forest entity and project biological inventories on a regular basis.

A forest certifier is a certification firm that has been approved by the State and the Registry as a "general certifier" that has also demonstrated its ability to assess forest entity and projects' biological inventories. Consequently, forest entities will only need to hire one certification firm to review both its biological and non-biological emissions.

The State and the Registry will release a Request for Application (RFA) annually to allow interested certifiers to apply to receive forest sector approval. Please check the Registry's website for additional RFA information: www.climateregistry.org/SERVICEPROVIDERS/ .

Certification firms interested in becoming approved forest sector certifiers must complete the following steps:

1. Submit an application in response to the State's RFA for forest certifiers.
2. Receive notice from the State that your application has been approved.
3. Attend a Registry Forest Sector Certification Training Session (held approximately two months following the State's notification of acceptance from its RFA).
4. Keep the State and Registry informed of any changes to your firm's organizational boundaries as well as any addition or deletion of staff to your "approved" team.

For additional information about becoming a State and Registry approved certifier, please refer to Part II of the Registry's General Certification Protocol.

As with all approved certifiers, your firm's approved certification status will be effective for 3 years from the time it is issued. After the 3 years has expired, certification firms must re-apply for renewal of their approval status by responding to the State's Request for Applications (RFA) in the year in which their approval will expire.

Certification Oversight by the State of California

Senate Bill 527 (Sher, 2001) directs the State of California (State) to observe certifiers during certification visits, evaluate whether the forest entity has a GHG accounting program consistent with Registry-approved procedures and protocols; and evaluate the reasonableness of the emissions information being reported. As part of the State of California's oversight of the Registry's certification process, representatives from appropriate state agencies may accompany approved certifiers in the course of core certification activities.

Section 42823 (b) of the California Health and Safety Code directs the Registry to coordinate with the Department of Forestry and Fire Protection (CDF) to develop the forest sector, forest project, and forest certification protocols. Consequently, CDF and/or another State representative may accompany a forest certifier as they complete the certification process to ensure consistent and accurate implementation of the relevant forest protocols as well as the reasonableness of a forest entity's reported data. The State may send an employee or contractor to accomplish this responsibility, and must report their findings to the Registry.

When requested by the forest entity, the agency will keep confidential the information resulting from its visit. Rules covering state agency confidentiality can be found in the California Code of Regulations, Title 20, Sect. 2501 et seq. and PRC 21160.

Part III: The Certification Process

Overview

The Registry's 10 step certification process is explained in detail in its General Certification Protocol (See also Annex 1). All 10 steps must be completed by the certifier to submit a certification opinion about the forest entity and project's biological and non-biological GHG emissions. Part of the 10 step certification process includes notifying the State of certification activities in order to comply with the State of California's oversight of certification activities (see Part II for more detail).

In order to certify a forest entity's biological inventory, you must use the guidance below to complete Part IV (Conducting Core Certification Activities) and the required documentation (Annex 2 & 3). Since forest entities will have both biological and non-biological GHG inventories to certify, you must complete the certification process for both the entity's non-biological inventory ***and*** biological inventory.

Forest Certification Cycle

Certification is required in years 1 and 6 of a 6-year forest certification cycle. While forest entities must certify their biological inventory based on this schedule, they may also choose to certify their entity's biological inventory on a more frequent basis.

To meet the Registry's conflict of interest policies, using this methodology one certifier would be able to conduct two complete certifications in years 1 and 6. Starting with Year 7 a new certifier must be chosen to begin the process for the next 6-year cycle (Table 1).

Under normal circumstances, certification activities should occur as follows:

Table 1. Forest Certification Cycle: Entities and Projects

Year	***Biological Emissions & C Stocks***	***Non-Biological Emissions***
Year 1	Conduct assessment of C stocks and stock change resulting in emissions reductions	Annually conduct certification activities to assess non-biological GHG Emission Report. (See the GCP for guidance on the certification process for non-biological GHGs.)
Years 2 – 5*	Review Annual Monitoring Report	
Year 6	Conduct assessment of C stocks and stock change resulting in emissions reductions	
Year 7 (Repeat Year 1)	Conduct assessment of C stocks and stock change resulting in emissions reductions	
Years 8 – 11 (Repeat Years 2-5)	Review Annual Monitoring Report	
Year 12 (Repeat Year 6)	Conduct assessment of C stocks and stock change resulting in emissions reductions	

****** Guidelines for direct sampling by the certifier is an element of Table 2; certifiers should use their discretion in all years as to when direct sampling may be necessary.*

Forest entities and projects should have collected and entered their GHG data into the Climate Action Registry's Reporting Online Tool (CARROT) and consequently be ready for certification by August 31st of the year following their reporting year. Certification activities should begin thereafter and be completed by December 31st of every year.

Annual Monitoring Reports

In addition to the certification activities above, you will review a forest entity's Annual Monitoring Report every year. You may also want to review any notices of harvest the reporter has filed with the CDF. The Annual Monitoring Report provides a leakage assessment by estimating projected changes in carbon stocks. While you will not "certify" the annual report, per se, you must complete a cursory check of the reported information to ensure the entity has not overlooked an event that would significantly impact the status of the forest inventory and GHG reporting. If the entity has experienced an event that significantly impacts the status of their forest inventory, the entity will need to directly sample each site within three years of its occurrence. Reporters should also explain any disturbances (tree removals, natural significant disturbances etc.) that occurred, the date of the disturbance(s), the extent of the disturbance and whether it was originally included in their original projected entity activities. If direct sampling does not occur in the year of the disturbance, a good faith estimate of the loss in carbon stocks should be made and subtracted from the carbon stock estimate.

Optional Reporting

The Annual GHG Emission Reports that a forest entity submits to the Registry may contain information in addition to and beyond the required information. All non-required GHG data is optional, and does not require certification. **NOTE***: if the certifier chooses to certify optional information using industry standard guidelines, this information can be disclosed in CARROT but will not be included in the Registry's required certified information. If the certifier is providing feedback on optional information, this could be considered consulting services and could create a conflict of interest.*

Optional information could include, for instance, information about a company's environmental policies and goals, etc. Optional information will be clearly distinguished from required (and certified) information in CARROT. This may also include quantification of forest carbon stocks and any changes in carbon pools that are not required, such as:

- Wood products
- Herbaceous understory
- Litter and duff
- Soil

Optional reporting exception: The Registry does not require reporting of an entity baseline. However, entity reporters are ***strongly encouraged*** to report a baseline. If an entity baseline is reported (see Table 2.3), this must be reviewed and certified.

Part IV: Conducting Core Certification Activities

Forest Entities

Overview of Forest Entity Certification

The goal of certifying biological inventories is to assess and confirm reported annual C stocks and any related CO_2 emissions for their entity-wide forest land.

The core certification activities for assessing biological inventories for forest entities consist of the following three steps:

- Identifying emission sources (required carbon pools)
- Reviewing inventory methodologies and forest management systems
- Verifying emission estimates (verify C stocks, stock changes, and estimated CO_2 emissions; for forest projects also include a leakage assessment)

The core certification activities are a risk assessment and data sampling effort aimed at ensuring complete entity-wide reporting meets the required level of accuracy. The complete core certification process is illustrated in Figure 1 below.

Figure 1. The Core Certification Process.

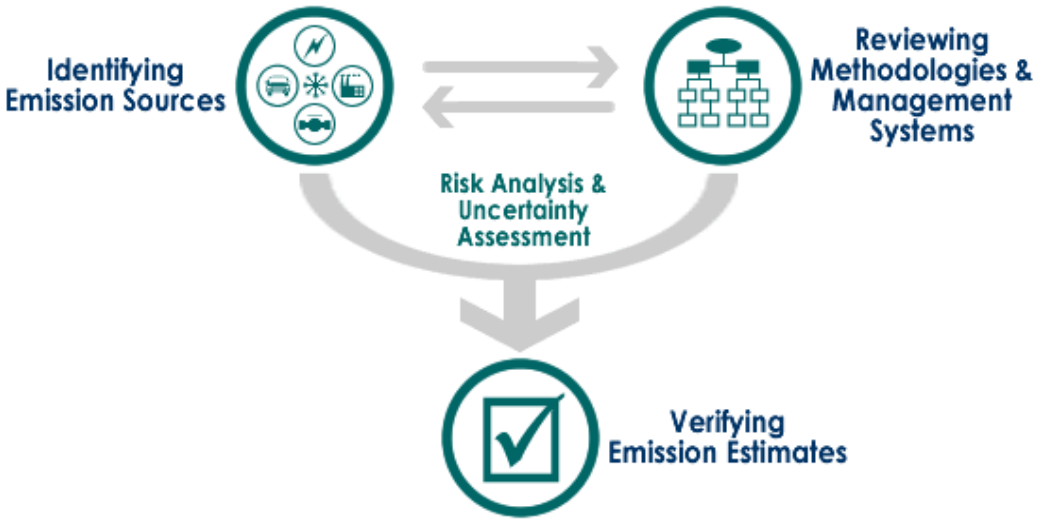

Table 2 provides guidance to determine if reports are free of material misstatements. This guidance outlines certification activities for both forest projects and forest entities to confirm accuracy in reporting. The distinction between review items for forest projects and forest entities is addressed in Table 2.

Forest Projects

Overview of Forest Project Certification

A forest entity that wishes to certify a forest project must also report and certify its entity-wide biological inventory as well as its non-biological emissions. **A forest entity must report its entity-wide biological C stocks and emissions to be eligible to report certified forest projects.**

The Registry currently recognizes three types of forest projects[1]:

Type 1: Conservation-based forest management projects
Type 2: Reforestation projects
Type 3: Conservation projects

Forest entities may wish to report and certify forest project activity in addition to their entity level biological inventory to generate certified GHG reductions to demonstrate their environmental actions and/or to sell such GHG reductions to another party in the evolving GHG market.

Project-level reporting of GHG reductions requires a higher level of certification scrutiny than entity-wide reporting, as forest projects have a higher probability of being used as a basis for emission trading and offsets. This increased level of certainty is necessary to ensure potential emission traders/brokers/buyers, etc. that the GHG reductions are both "real" and "additional" as defined by the Registry.

Conducting Core Certification Activities: All Forest Projects

The certification activities necessary to certify forest projects are similar to those outlined in Part IV: Core Certification Activities: Forest Entities above. However, forest project certification includes an assessment of the project baseline and project activity in addition to the calculation of emission reductions.

The core certification activities for forest projects are:

- Review and confirm project eligibility
  - Confirm the forest entity has met the Registry's reporting criteria
- Review and assess forest management systems to measure emission sources
- Review and assess project baseline and project activity
  - Assess projected and actual annual Carbon (C) stocks, stock changes, and any CO_2 emissions or reductions within the project
  - Assess the quality of the project's (qualitative) baseline characterization and its corresponding (quantitative) carbon baseline estimate
  - Confirm that the project activity is being implemented as planned
- Confirm project emissions & reduction calculations
  - Assess changes in carbon stocks over time, relative to baseline
- Perform leakage assessment

[1] While only three forest projects are currently eligible for reporting, the Registry may consider additional types of forest projects in the future.

- Assess any activity-shifting leakage associated with the project within the entity's boundaries

To document your review/assessment of each of the certification steps for each project, you must complete the Certification Activities Log (Annex 2) for each forest project you certify.

Table 2.8 contains key elements to consider prior to assessing the impact of activity shifting leakage that occurs within entity boundaries. These steps only need to be completed if 1) an entity level baseline projection is established, and the annually reported carbon stocks are lower than the projected carbon stocks (entity baseline) or 2) if no entity baseline projection is established, and reported carbon stocks decline between reporting years. Negative deviations between actual inventory measurements and projected inventory estimates or previous reporting years may or may not represent leakage. If, however, a deviation in C stocks is not due to inaccurate growth models, inventory updates, or natural disturbances (see Table 2.8), you should assume that there is leakage, which must be estimated and deducted from any claimed project reductions.

The steps above should be completed using the guidance provided in Table 2. The guidance outlined therein describes certification activities for both forest projects and forest entities to confirm accuracy in reporting. The distinction between review items for forest projects and forest entities is addressed in Table 2.

Table 2: Certification Review Guides for Entity and Project Forest Carbon Inventories, Baselines, and Emissions/Reductions Calculations

This section is designed to inform a detailed review of forest entity or project reports, relying on your professional judgment, assessment of any material errors, and verification of compliance with the specific criteria/standards outlined in the Forest Sector and Forest Project Protocols.

The process to determine compliance with the minimum quality standard is outlined in the following sections. Use the guidance in Table 2.1 – 2.8 to complete your assessment of the forest entity and forest project.

This Review Guide is intended to assist certifiers in reviewing inventories, inventory projections, leakage assessments, and general reporting for both entity registration and project registration. Certain review items can be common to both entities and projects, while others are unique to projects. The certifier will assess the entity and the project independently.

The goal of the Table 2 inventory review is for the certifier to be confident that the carbon inventory is reasonable, including any projections associated with entity or project level reporting. The tables in the review guide provide a list of elements for review. **NOTE**: An entity cannot be certified if it is determined that the submitter has inadequately substantiated the associated carbon levels by:

- Failing to include any of the required elements within the protocols, or
- Failing to provide adequate documentation to convince the certifier that the systems are sound.
- Providing incorrect information.

The design of this detailed review will depend in large part on your professional judgment and your assessment of the potential for material error or departure from the Forest Protocols. You must then carry out the detailed certification activities you deem appropriate to confirm the accuracy and verifiability of the biological inventory.

There is no scoring system. The certifier should feel confident that the forest carbon inventory, projections, and reported emissions and emission reductions are sound at a high level of review (first level review), or may wish to solicit more information and conduct more analysis to achieve a satisfactory level of confidence (second level review). The certifier will consolidate the results of their review in Annex 2. Opinions must be expressed as certified without qualification or unable to certify.

When conducting certification activities for an entity or project report, other than the initial registration, if any of the possible causes of the reporting disparities (e.g., inaccurate growth models) are found to be applicable, the project may not be certifiable and the project developer must engage in some form of corrective action to enable registration and/or reduce the likelihood of the problem reoccurring in the future.

Each element within table 2 should be reviewed for adherence to the guidance outlined in the FSP or FPP.

Overview of structure for Table 2: Where review is required for the Entity report, this is indicated by an **E** in the right-hand column of each title. Where review is required for the Project report, this is indicated by a **P** in the right-hand column of each title. For instance, general certification elements are required for both entities and projects. This is indicated as follows:

2.1 General Certification Elements Reviewed for both Entities and Projects	E	P

Explanation of First Level Review	Explanation of Second Level Review
This column includes items that provide a basic level of review for inventories. If the certifier feels confident that the information provided is appropriate with the review at this level they should proceed to the next item. The items listed in the second level review provide the basis to perform additional research into the theme prior to arriving at a decision.	This column includes items that could be requested in order to provide a more detailed analysis of the item under review. The certifier will incorporate these items when a reasonable level of confidence with the item under review does not exist and further review is needed in order to make a decision.
Title of Section	
First Level Review	**Second Level Review**

Certification activity for entities should be conducted prior to forest project certification activities. Certification activities should be conducted according to the workflow detailed below:

In Year 1 complete review for Forest entity and projects in the following order:	
1. Non-biological inventory	1. Certifier reviews Total Emissions Summary in CARROT
	2. Review supporting documentation (fuel records, electric bills, etc.)
	3. Participant may revise Total Emissions Summary based on Certifier feedback
2. Biological entity inventory 3. Project biological inventory	1. Registered Professional Forester reviews Entity/Project reporting forms
	2. Forest Certifier team reviews supporting documentation (modeling assumptions, etc.) and conducts leakage assessment*
	3. Participant may revise Forms based on certifier feedback

**You may not need to conduct a leakage assessment if the reporter is only submitting entity emissions* or *is in their first year of reporting and do not yet have reductions to be certified.*

In Year 2 and onward, complete review for Forest entity and projects as follows:	
1. Non-biological inventory	1. Certifier reviews Total Emissions Summary in CARROT
	2. Review supporting documentation (fuel records, electric bills, etc.)
	3. Participant may revise Total Emissions Summary based on Certifier feedback
2. Biological entity inventory 3. Project biological inventory	1. Registered Professional Forester reviews Entity/Project reporting forms
	2. Forest Certifier team reviews supporting documentation (modeling assumptions, etc.) and conducts leakage assessment*
	3. Participant may revise Forms based on certifier feedback

**You may not need to conduct a leakage assessment if the reporter is only submitting entity emissions* or *is in their first year of reporting and do not yet have reductions to be certified.*

2.1 Review and Confirm Entity Eligibility **Reviewed for Entity only**	**E**
1. Does the entity own at least 100 acres of commercial and/or non-commercial trees? 2. Has the entity aggregated its GHG data by equity share or management control? • If aggregated by equity share, confirm equity ownership and ensure other equity owners have also agreed to report by equity share. • If aggregated by management control, confirm all equity owners, and ensure that the inventory is not being double counted.	

2.2 General Certification Elements **Reviewed for both Entities and Projects**	**E**	**P**
1. Review the reported biological inventory and emissions **in CARROT** • Have harvests/removals been reported during the reporting year (or since the last certification)? 2. Confirm that the project developer has identified the types of **non-biological emissions** that result from the project in their non-biological inventory. These emissions do not need to be quantified, but must be identified in the project report. For example, "As a result of a forest project, 5 trucks will be used, hauling equipment will be used, and the lumber mill that is owned by the forest entity will also operate to process the harvested timber."		

2.3 Inventory Projections of Entity Baseline **Reviewed for Entity only** Descriptions of future management practices are a part of developing a projection of inventory stocks. *Entity projections are optional, but strongly encouraged.* If entity projections are reported they must be certified. The description of anticipated future management practices for entities shall be reviewed if an entity projection is provided. Since project baseline projections are not optional and are based, in part on policy prescriptions, a description and separate analysis of project baselines must be reviewed (See Table 2.5). **NOTE: Adjusting a forest entity inventory projection or baseline.** An entity's inventory projection and/or baseline should be adjusted if any of the following actions, or combination of actions, occur and change the entity's annually reported total C stocks by +/- 10%. The actions that will trigger an entity baseline adjustment include (Forest Sector Protocol Section V.C): • Structural Changes in Your Organization • Shifting of Emissions Sources • Catastrophic Event • Implementation of improved carbon measurement technique • Inaccurate growth assumptions • Changes in management practices To complete a review of this adjustment you should also review any historical baseline projections as well as new adjustments to fully understand the progression of activities.	**E**
1. Clear description of: • Silvicultural prescriptions applied as part of the entity baseline (Option see silviculture standards which define the max. harvesting allowed) • Constraints to the application of silviculture methods, such as sensitive areas, riparian zones, sensitive wildlife habitat associated with project activity	1. Review scheduling of future silvicultural activities associated with project activity, including: • Harvest yield streams • Location and area of silvicultural events. • History of implementing proposed practices • Compliance with Forest Practice Act and Regulations

2. Clear description of: • Silvicultural prescriptions applied as part of the baseline characterization • Constraints to the application of silviculture methods, such as sensitive areas, riparian zones, sensitive wildlife habitat associated with baseline characterization 3. Well-articulated descriptions of future forest conditions in terms of inventory targets, restoration goals, etc., as applicable.	2. Review scheduling of future silvicultural activities associated with baseline characterization, including: • Harvest yield streams • Location and area of silvicultural events. • History of implementing proposed practices • Compliance with Forest Practice Act and Regulations

2.4 Basic Review of Forest Carbon Inventory Documentation: Entities and Projects **Reviewed for both Entities and Projects**	**E**	**P**
A. Identifying Potential Emission Sources/Carbon Pools The first step in conducting the certification activities is to identify potential GHG emission sources. This requires you to review a forest entity's geographic, organizational, and operational boundaries to assess if the Registry's required carbon pools have been correctly identified and included in the biological inventory.		
2.4.A.1 Summary and Ownership Maps	**E**	**P**
1. Are the ownership maps complete and in proper order? For instance, do maps include: • Entity boundaries • Latitude/longitude • Topography • Forest vegetation • Site classes 2. Does the entity/project summary provided in the Registry's registration forms clearly and correctly describe the entity/project? 3. Is it clear what structural changes have occurred within the entity since the previous certification? (e.g., due to acquisitions, mergers, divestitures, outsourcing, etc.)	1. Request revised ownership map that is neat and well-organized. 2. Review Ownership Maps against other data sources: • Parcel data • Compare to known boundaries 3. If ownership cannot be clearly demonstrated, it may be necessary to call on a licensed surveyor to confirm ownership boundaries.	
2.4.A.2 Description of General Forest Conditions	**E**	**P**
1. Is a satisfactory general description of the existing forest conditions provided for the project? For example, does the general description include: • Temperature and precipitation ranges • Topography • Species mix of canopy and understory vegetation • Biological growth capability • Pressures on land use practices	1. Interview local foresters regarding common issues such as • Soil issues (productivity, erosion) • Species composition (shift to shade tolerant, hardwood) • Forest health such as insects or disease. 2. Review • Timber Harvest Plan (THP) histories • General plan • Yield tables • Record of major natural or man-made disturbances	

2.4.A.3 Planning Documents	E	P
1. Does an inventory planning document exist? 2. Does the inventory document provide adequate guidance to implement the inventory? 3. Does the inventory plan describe how sampling is managed so that it is reasonably representative of forest stand conditions? 4. Has the project developer assigned a qualified individual with the responsibility to oversee direct sampling and annual monitoring report submission to the Registry?	1. If no planning document exists, one must be prepared before certification activities can proceed. 2. If inventory guidance is inadequate, request further explanation of how quality control was provided for in inventory. 3. Request more information on how sampling design will be changed and insure accuracy of future estimates. 4. Determine that project developer will maintain quality control and adhere to inventory schedule.	

B. Measurement Methodologies and Management Systems

After you have confirmed the scope and comprehensiveness of the forest entity or project's biological inventory you must review the sampling methodologies and techniques, calculation methodologies, growth projection models, and GHG management systems used to report their GHG activity to the Registry.

2.4.B.1 Vegetation Typing Methodology	E	P
1. If the forest vegetation is rendered into a vegetation type map, review: • Vegetation typing rules. • Update process used to identify vegetation changes resulting from harvest, growth, or significant disturbance. • Comparison of aerial photos to mapped vegetation polygons. If used, does the stratification reflect the variability in the forest? 2. If the forest vegetation is not rendered into a vegetation type map, review should include a(n): • Explanation of the decision not to stratify the inventory area. • Comparison of inventory summaries with stand designations. • Review of photos (high contrast in vegetative cover may suggest stratification would provide a more realistic picture of the ground conditions) • Review of inventory to determine if any large areas of distinct difference exist that might overly bias projections. 3. Confirm that structural changes (e.g., acquisitions, mergers, divestitures, outsourcing) are accurately reflected in ownership boundaries.	1. If the forest vegetation is rendered into a vegetation type map: • Conduct field visit to random portions of the ownership to compare mapped areas with actual field conditions. 2. If forest vegetation is not rendered into a vegetation type map: • Do constrained (sensitive or biologically-restricted) areas exist that are large enough to bias any projection? • Should types exist where management will differ because of conditions? • Consider reviewing Board of Equalization records for harvest volumes. • Consider reviewing (California Department of Forestry & Fire Protection's "Fire and Resource Assessment Program (FRAP) (http://frap.cdf.ca.gov/) change detection data for determination of the location of natural disasters.	

2.4.B.2 Sampling Methodology	E	P
1. Assess: • Determination of number of plots. • Allocation of plots to various vegetation types. • Plot installation directions provided to the field crews. • Rationale used in plot layout design. • Bias of plot layout selection, when laid over the geography being sampled.	1. Review statistical procedures used for determination of plots required to arrive at values within 10% of the mean to achieve 90% confidence. • Does the sampling intensity appear adequate to have generated the stated confidence limits? 2. Plot type and measurement: • Conduct field review: Randomly select an initial subset of plots to visit, and	

• Appropriateness of sampling methodology (variable radius, fixed, transect, etc.) for the item being measured (tree, dead, litter, soil). • Data cards or readouts for any anomalies that may indicate error (either individual plots or groups of plots).	check carbon stock measurements to see if similar results are recorded. If the sample plot measurements differ by < 15% of reported measurements, this level of review may be sufficient. • When driving or walking through an area compare the data records to what is seen visually and ask if it makes sense. If not, a more detailed plot review may be necessary. • Where significant differences are found with checked plots, conduct field review in the company of the proponent to determine if re-measurement of the strata or full inventory is needed. • Where past inventories did not have permanently documented plot centers, the certifier and proponent may agree upon a methodology to check the accuracy of the samples used to produce the inventory. Where an agreement can not be reached, CDF shall be contacted at which time CDF shall specify the means by which the dispute will be resolved.

2.4.B.3 Description of Existing Stand Conditions	**E**	**P**
1. Is a description of existing inventory conditions provided? Are the inventory systems appropriately sophisticated for the project? This may include review of maps and reports that display: • Inventory summaries (volume, basal area, density) by area (or stand). • Summary of vegetation types by area. • Summary of habitat types by area. 2. Conduct a field visit (minimum of one-day) to compare inventory reports and descriptions to actual data.	1. Conduct additional field scrutiny to compare actual field conditions with summary reports. 2. A field review of random plots may be warranted if field conditions do not align well with summary reports. 3. Verification of inventory by other parties including California Forest Practices review or third-party forest certification, where applicable.	

2.5 Forest Project Eligibility and Baseline / Activity Characterizations (Projects Only)	**P**

A forest project baseline characterization is the long-term projection of management practices (or absence thereof) that would have occurred within a project's physical boundaries in the absence of the project. The Registry provides specific criteria for characterizing the project baseline for each project type. Reviewing and confirming a forest project baseline characterization is critical to the certification process because it serves as the benchmark for determining carbon stock changes and any resulting GHG reductions from the project activity.

The certifier must discuss with the forest entity how the project baseline was selected and characterized, and assess if the chosen project baseline characterization is accurate/appropriate given the specific forest project baseline criteria, relevant land use laws, and public (and historical) knowledge of the forest project area and its activities. The certifier must also confirm that the project activity is additional, that is, the activity practices exceed those outlined in the baseline characterization.

While most forest projects will likely initially set forest project baselines in the current reporting year, forest entities are able to report projects that were implemented in past years (back to 1990) as long as they can meet all of the project eligibility criteria and reporting requirements. To report a forest project with a historical baseline initiation date, forest entities will need to report and seek certification for each year of the project from the forest project baseline year up to the present. For example, if a forest entity reported a forest project in 2004 that was initiated with a project baseline in 2002, they need

to report and certify the forest project for those 3 years: 2002, 2003, and 2004.

NOTE: Impacts of disturbances on project activity reporting

Once you confirm a forest project's baseline characterization, it will remain the baseline for the duration of the project. A forest entity is not required to adjust their project baseline characterization. In the case where the project boundaries change, a new project for that additional area must be initiated. In a case where a significant natural disturbance occurs within the project boundary, and carbon stocks decrease, a forest entity must report the resulting change in carbon stocks (Table 2.3). If this change in carbon stocks is substantial (e.g., a significant natural disturbance destroys 20% of the carbon stocks), then the forest entity may choose to cancel project reporting or update the inventory, both of which are permitted by the Registry. If a natural significant disturbance or an unplanned harvest/removal occurs in the project area, direct sampling of the affected area by the project developer and certifier is required to occur within 3 years of the date the disturbance or at the next scheduled certification, whichever would occur first.

A. Confirm Project Eligibility

The first step in the certification activities for forest projects is to confirm the reported project's eligibility. This is necessary because the Registry has only developed standardized reporting and certification guidance for a few select GHG reduction projects. Only those projects identified by the Registry may be registered as "GHG reduction projects."

The Registry does not restrict forest entities from conducting other GHG reduction activities outside of the three Registry-approved forest projects. However, the Registry does not certify GHG reductions from other forest project activities at this time. Forest entities should thus report other GHG reduction activities in the optional text boxes provided in the CARROT forms.

NOTE: *You CANNOT provide consulting services or make design recommendations to the project developer/forest entity, as this would violate the Registry's Conflict of Interest code. However, you should describe where/why the project does not meet the registration criteria.*

1. If a forest entity opted to use the Registry's "pre-screening" process, review the Project Pre-screening Worksheet and any of the Registry's comments.	If the forest entity did not utilize the Registry's pre-screening process, then carefully review the project summary to ensure all of the criteria in 1 and 2 above have been met. If projects do not meet all of the eligibility requirements, they cannot be certified.

2. Confirm the forest project is one of the three approved project types (conservation based forest management, reforestation, or conservation).

3. Confirm the project is:
- Located in its entirety in the State of California
- Using native California species (as identified in the CA Department of Fish and Game's "A Guide to Wildlife Habitats of California")
- Through 2008 projects can set a start date from the year 1990 or later; after 2008 all projects must have current initiation dates

4. Confirm that the project area is secured with a perpetual conservation easement that:
- Has been recorded by the time any reductions are certfied
- Includes in its recitals a statement of intent that the easement is perpetual and conforms with Section 42823 of the California Public Health and Safety Code and
- Includes terms that are generally compatible with the project activity

5. If not already completed, confirm the forest entity's reporting responsibility to the Registry:
- Does the entity own at least 100 acres of commercial and/or non-commercial trees?
- Has the entity aggregated its GHG data by equity share or management control?
- If aggregated by equity share, confirm equity ownership and ensure other equity owners have also agreed to report by equity share.
- If aggregated by management control, confirm all equity owners, and ensure that the inventory is not being double counted.

6. Review and confirm the geographic boundaries of the forest project.

B. Certification Activities Related to Specific Forest Projects

2.5.B.1 Conservation-based Forest Management

P

Conservation-based forest management projects are projects that intend to create additional C stocks in a forest area through modifications of harvest and regeneration practices. Conservation-based forest management projects only track changes in biological C stocks, CO_2 emissions and emission reductions.

1. Review and Assess Forest Conservation Baseline Assessment

For conservation-based forest management projects, the forest project baseline must be the C stocks that would result if the project developer was managing its forestland pursuant to the "Option C Rules" of the California Forest Practices Act and applicable county level forest management laws and harvesting to the limit permitted by these laws and related regulations. Thus, a successful conservation-based forest management project will produce C stocks that are additional to those that would have resulted to meet all forest management regulations at the time the project is registered in the Registry.

2. Project Activity

Confirm that at least the project activities are exceeding what is required by law (e.g. retaining more basal area than required by law; wider stream buffers etc.).

2.5.B.2 Reforestation

P

Reforestation projects aim to restore native forests to lands that were once forested, but have been out of forest cover for at least 10 years.

1. Confirm:
   - Seed zone source for seedlings
   - Seedling transportation and storage records
   - Planting instructions and training provided to the labor force planting the trees
   - Date of planting
   - Any actions used as follow-up for planting.

2. If NO to either of the points below, project is NOT certifiable:
   - Will the project use native species?
   - Has the project been out of forest cover for at least 10 years?

3. Review and Assess Reforestation Baseline

For reforestation projects, the forest project baseline must be the quantity of C stocks that would result from the existing use of the land, which would include the natural growth of the existing trees on the land, if applicable.

To qualify as a reforestation project, there can be no land use statutes or regulations that require reforestation of the project area at the time the project baseline is initiated.

To assess the appropriateness of a forest project baseline for reforestation projects, you must do the following:

i. Review the forest entity's statement/documentation/attestation that no statutes/regulations requiring reforestation of the project area exist.
   a. Confirm by reviewing existing local land/zoning laws.

ii. Review existing practices in project area and any state and county records to confirm project area has been out of forest cover for at least ten years prior to project initiation
   a. Review CDF's FRAP change detection database.
   b. Other references include Wildlife Habitat Relationship database (For example: http://www.dfg.ca.gov/bdb/html/by_program_cwhr.html) and the Natural Resource Conservation

Service's landowner assistance programs.

iii. Confirm that the forest entity has accurately characterized the forest project baseline and the estimate of the forest carbon stock that would have resulted if the project was not introduced.

To review and assess reforestation activities, you must:

- Confirm that reforestation of native species is actually planned (and being implemented).

2.5.B.3 CONSERVATION

Conservation projects aim to protect forestland from conversion to other uses (development, agriculture, etc.).

P

1. Review and Assess Conservation Baseline

The Registry subdivides conservation projects into two types:

- Projects based on immediate site-specific threats
- Projects based on state & county land use trends

Threat-specific projects are defined by a known and imminent threat of conversion (within 5 years of project initiation data), for example, a developer offering a sum for X acres to be cleared for a housing development. Conservation projects based on trends are those wherein forest lands are protected from conversions in areas that have been identified by the state and county through land use conversion trends, as subject to conversion over time.

For either type of conservation project, the project baseline must reflect the C stocks that would result if the forest area were converted at the rate of either 1) the imminent threat of conversion or 2) the specified conversion rates by county as outlined in Annex A of the FPP. The forest carbon stocks of the project activity must reflect the existing forested area, as well as the normal projected growth and decline of the project area, in compliance with existing mandatory, state and county land use laws.

2. Review contract/purchase offer documentation for site specific immediate threat conservation projects and assess if the threat is indeed imminent (i.e., would occur within next 5 years) and confirm that the area of forestland would be lost if the development ensued; or

3. If the project is dependent on county and state land use trends, review and confirm the most recent state and county local land use data pursuant to Table F of the FPP to determine the rate of land use change for ongoing conservation projects.

Example: if the county's rate of land use change where the forest project is located is 2% per year, then the conservation project should assume that the conserved carbon stocks will be 2% for the next 50 years (until 100% of the area has been conserved).

2.6 Inventory Projections of Project Activity and Project Baseline

A forest project baseline characterization is the long-term projection of management practices (or absence thereof) that would have occurred within a project's physical boundaries in the absence of the project. The Registry provides specific criteria for characterizing the project baseline for each project type. Reviewing and confirming a forest project baseline characterization is critical to the certification process because it serves as the benchmark for determining carbon stock changes and any resulting GHG reductions from the project activity.

Since project baseline and activity projections are not optional, a description of project baselines and activities shall be reviewed for projects.

P

1. Documentation includes a description of specific management activities included within the project activity, which are the basis of additional carbon stocks above baseline conditions. The defined activities provide guidance for growth and yield modeling. Examples might include descriptions for: • Extended rotations • Restoration activities • Silviculture strategies that increase retention	1. Review scheduling of future silvicultural activities associated with project activity, including: • Harvest yield streams • Location and area of silvicultural events. • History of implementing proposed practices • Compliance with Forest Practice Act and Regulations 2. Review scheduling of future silvicultural activities associated with baseline characterization, including:

2. Clear description of: • Silvicultural prescriptions applied as part of the project activity • Constraints to the application of silviculture methods, such as sensitive areas, riparian zones, sensitive wildlife habitat associated with project activity 3. Clear description of: • Silvicultural prescriptions applied as part of the baseline characterization • Constraints to the application of silviculture methods, such as sensitive areas, riparian zones, sensitive wildlife habitat associated with baseline characterization 4. Well-articulated descriptions of future forest conditions in terms of inventory targets, restoration goals, etc., as applicable.	• Harvest yield streams • Location and area of silvicultural events. • History of implementing proposed practices • Compliance with Forest Practice Act and Regulations

2.7 Calculating C Stock Change, Emissions and Emissions Reductions: Entity and Project Level Reporting	**E**	**P**
A. Projections and Comparisons of Future Carbon Stocks and Carbon Calculations to Determine Change (T2 – T1) and Emissions Reductions *Change in carbon over time is reviewed for entities if an entity projection is provided. Change in carbon over time will be reviewed for all projects.*		
1. If the project submitter has used methodologies outlined in the Forest Project Protocol for calculation of carbon in all pools (trees and roots; standing dead, lying dead, litter, herbaceous, and wood products): • Determine if methodologies have been correctly implemented. • If implementation is appropriate, no further review of calculation method may be necessary. 2. Are models used for project and baseline projections listed in the Forest Project Protocols (page 55)? 3. If so, assess: • Creation of tree lists in the inventory for growth and yield modeling • Accommodation of harvesting • Mortality • In-growth • Model calibration • Site class data If the methodologies outlined in FPP are not followed, a second level of review is required.	1. Where model not referenced in the Forest Protocols is used, conduct a test run using one of the recommended models. If outcome is significantly different, proponent should provide in-depth explanation as to why specific model was used. 2. Does the methodology appear in "Measuring and Monitoring Forestry Carbon Projects in California" (Brown, *et al*. 2004) Publication 500-04-072F, available at the California Energy Commission website: http://www.energy.ca.gov/pier/final_project_reports/500-04-072F.html 3. Items to be considered under a listed model include: • Volume harvested on a periodic basis from individual stands. • Growth projections used are published and calibrated for local data. • Growth projections used are not published, but are well documented and defensible. • Stand table projections are used to determine growth and are based on empirical data. If agreement cannot be reached as to choice of model, contact CDF for final approval on use of model. Provide detailed explanation of process; submit to CDF and	

	Registry for approval. If questions remain as to acceptability of methodology, contact CDF for clarification.

B. Confirm Project Emission & Reduction Calculations (All Forest Projects)

Once you have confirmed a project's eligibility, forest project baseline, and forest project activities, you must conduct an (ex-post) sub-sampling exercise within the project area to confirm the project developer's estimated and sampled C stocks and resulting GHG emissions or reductions.

- Check the math on the reduction calculation.
- Does the reduction seem reasonable given the forest activity and growth environment?

2.8 Leakage Review and Calculation: Forest Projects Only

P

In order to determine the cause for a deviation in a forest entity's reporting or projections, i.e. projected carbon stocks, the certifier must review the following three elements: Inaccurate Growth Assumptions, Inventory Updates, and Natural Disturbances.

If the certifier determines that a deviation in the forest entity's reporting or projections are due to one of the three elements, then the reporter must adjust their model and regenerate their baseline (Table 2.3). If the deviation of current stocks from projected stocks is not due to one of these three elements, you should assume that there is activity-shifting leakage, estimate the amount, and subtract it from the certified project reductions. Assessment and quantification of on-site activity-shifting leakage shall be made annually. However, the certification of any occurrences of this activity-shifting leakage will correspond with the certification intervals, which occur at a minimum of interval of every six years. Examples of activity-shifting leakage include:

- Unusual entity and business practices, i.e. harvests exceed activities in timber management plan.
- Omission of information on harvesting from other parts of the ownership.
- Failure to recognize significant stock disturbances such as fire, insect, or disease.

Activity-shifting leakage can only occur if the project is a sub-set of the entity.

A. Leakage Assessment

Leakage assessment is *required* for all projects.

2.8.A.1 Assess Accuracy of Projected Entity Activities

1. If a forest entity's projected carbon stocks from its entity/project activities differ from their direct sampling results by +/- 10%, you must confirm that they have adjusted their forest entity/project's growth projection model in the current year to reflect the overstatement/understatement of emission reductions/changes in C stocks in past years, and to reflect the likely change in carbon stocks from the entity/project activity over time.

2. Review annual monitoring reports since the last direct sampling to ensure the projected emissions/change in carbon stocks are reasonable.

2.8.A.2 Determination of Leakage

1. Confirm that the project developer has considered and described possible activity-shifting leakage resulting from the project activity and any planned mitigation action.
    a. Refer to the description of possible leakage in the Initial Leakage Assessment (See Annex A of FPP).

2. If you determine that none of the elements below influence the disparity between carbon stock projections and actual carbon stocks, or that the percentage assigned to the element does not add up to 100%, an assumption of activity shifting leakage will arise and the leakage will be treated as an emission.

2.8.A.3 Element Review

The three elements below are indicators that may lead a projected activity to vary from the actual inventory (in other words, these may explain deviations that are NOT due to leakage).

Element 1. **Inaccurate Growth Assumptions**

Projections of carbon stocks are based on growth models. If growth estimates used in the projection of the entity's baseline are overestimated, actual carbon stocks may decline below the projected carbon stocks. Overestimates of growth may be due to an overstatement of site quality, a need to calibrate the model to local conditions, or to an inappropriate application of the growth model. Overestimated growth projections should be suspected if, within the same time period, the project submitter did not exceed the projections of carbon removal (harvest) while estimates of carbon stocks decline below entity projections.

Possible Cause	*Reviewed and not considered to be a rationale for disparity between carbon stock projections and actual carbon stocks.*	*Reviewed and found to be a likely cause for some or all of the disparity between carbon stock projections and actual carbon stocks.* *Apply an estimated effect of the cause on the disparity as a percentage.*
Inaccurate site class designation		
Model not appropriate for site		
Growth model not calibrated correctly		

Element 2. **Inventory Updates**

The forestry protocols allow the use of plot data from sampling activities to be used if the sampling activity was performed within the last two certification cycles. Sampling activities are likely to be an ongoing activity for most forest project developers. Sampling activities may take place to replace retired plot data or to increase the confidence in the inventory estimate. Adding plots may alter the original inventory estimate used in creating the entity baseline, even after adjusting the original estimate for growth. The degree of change will depend on the level of confidence that existed in the original inventory estimate. Additional plot data will have less of an effect with an inventory that has a high level of confidence than one that has a low level of confidence.

The comparisons of actual inventory to projected inventory should be made at cycles synchronized with output years from the model (i.e. 5 years). Annual variations from inventory or harvest projections may be the result of market fluctuations, leading to above or below average harvests, and do not constitute a reasonable case for leakage.

Possible Cause	*Reviewed and not considered to be a rationale for disparity between carbon stock projections and actual carbon stocks.*	*Reviewed and found to be a likely cause for some or all of the disparity between carbon stock projections and actual carbon stocks.* *Apply an estimated effect of the cause on the disparity as a percentage.*
Additional plots indicate that the previous estimate of actual carbon stocks was overestimated.		

Element 3. **Natural Disturbances**

Fires, disease, and pests are examples of agents that reduce forest carbon stocks and are often beyond control of humans to control. While not the result of activity shifting carbon removal, the occurrence of such agents on an entity may play a role in reducing actual carbon stocks below predicted carbon stocks.

Possible Cause	*Reviewed and not considered to be a rationale for disparity between carbon stock projections and actual carbon stocks.*	*Reviewed and found to be a likely cause for some or all of the disparity between carbon stock projections and actual carbon stocks.* *Apply an estimated effect of the cause on the disparity as a percentage.*
Fire, wind, disease, etc. have reduced actual carbon stocks.		

B. Market Leakage: ***Optional reporting information***
SHOULD NOT BE CERTIFIED

Note: More consideration/guidance needs to be given to this topic, it is widely recognized that market leakage is difficult to assess. Without guidance, no certification activities are required.

C. Statement of Quality

After completing these elements of the review, you should asses the quality of the reported inventory.

1. Does the entity and project's inventory meet the minimum quality standard?
   - Check minimum quality standard requirements in the FSP and FPP

If the inventory meets the minimum quality standard, prepare certification documentation (see Part V).

If the inventory does not meet the minimum quality standard, reporter has the opportunity to take corrective actions.
- Forest Entities should adjust their baseline and C stock projections.
- Forest Projects should adjust their reported reductions.

Part V. Completing the Certification Process

After completing the core project certification activities for a forest entity (and related forest projects), you are ready to complete the certification process. The process to complete the certification activities is described in the General Certification Protocol. The only modification to the process for certifying biological inventories is that in addition to preparing a Certification Log and Certification Opinion for a forest entity's non-biological emissions, you must ALSO prepare a Certification Log and Certification Opinion for their biological inventory as well as for each specific forest project.

Therefore, upon completion of the certification activities for a forest entity, you must prepare the following documentation:

For a year in which you certify a forest entity's biological inventory:

- Certification Report (This report should include a summary of both non-biological and biological processes, outcomes, and successes and weaknesses.)
- Certification Log – Non biological emissions
- Certification Log – Biological inventory
- Certification Opinion – Non biological emissions
- Certification Opinion – Biological inventory

If you also certify the forest entity's forest project(s), you must complete the following:

- Project Certification Report – this summary will be available to the public
- Certification Log – for the specific project type
- Certification Opinion – for the specific project type

In addition to the required documentation, you will need to submit your findings in CARROT.

Finalizing Certification

The Registry will consider both the Certification Opinion and the information contained in the Certification Activities Log in its final review of GHG data before accepting a forest entity or forest project's data into the Registry. Once a forest entity has submitted certified Annual Emission Reports for its entity (and any projects), and the reports have been reviewed and accepted by the Registry, the reporting and certification process is complete for the reporting year.

Questions: contact help@climateregistry.org or 213-891-1444.

Part VI: Annexes

ANNEX 1. Overview of the California Climate Action Registry's Certification Process

1. Participant selects Certifier: Participants contacts one or more CEC/Registry-approved certifiers to discuss certification activities. Participants select an organization to certify its GHG emissions and begin to negotiate contract terms.

2. Certifier Submits Case-Specific Conflict of Interest (COI) Evaluation Form: After a participant chooses a certifier, the Certifier must submit a Conflict of Interest Evaluation Form to the Registry to establish that the likelihood of a COI between parties is low.

3. CEC Sends Notification of COI Evaluation to Certifier: The Registry reviews the COI Evaluation Form to determine the level of risk associated with the proposed participant/certifier relationship, and notifies the certifier of its assessment.

4. Certifier & Participant Finalize Contract: Once the Registry has determined that a COI between a Participant and Certifier is not likely, certifiers may finalize their contracts with Registry participants.

5. Certifier Submits Certification Notification Form to CEC: Certifier must complete and submit a Certification Notification Form to the CEC at least 10 business days prior to beginning certification activities.

6. Certifier Conducts Certification Activities: Certifier follows the guidance in the Certification Protocol to evaluate a participant's Annual GHG Emission Report.

7. Certifier Prepares Certification Report and Certification Opinion for Participant: Certifier prepares a detailed summary (Certification Report) of the certification activities for the participant. Certifier also prepares a general Certification Opinion for participant's review.

8. Certifier & Participant Discuss Certification Report and Opinion: Certifier meets with participant to discuss Certification Report and Opinion**.**

9. Certifier Completes Certification Form via CARROT: Once authorized by a participant, a Certifier completes the Certification Form via CARROT. Participant submits certified Annual GHG Emission Report to the Registry and mail original Certification Opinion to the Registry.

10. Registry Completes Reporting Process: Registry reviews the Certification Opinion and evaluates the participant's Emission Report. Once accepted by the Registry, a participant**'**s aggregated entity-level emissions become available to the public via CARROT.

Subsequent Certification: *Even in multi-year certification contracts, Certifiers must repeat steps 2-10 for each year that it certifies GHG emissions for submission to the Registry.*

ANNEX 2. Biological Inventory Certification Activities Log

[Will be revised once all comments are received and integrated.]

Preparing for Certification	Date Achieved
Bid on a Certification Contract	
Request determination of COI from CEC	
Negotiate Contract with Registry Forest entity	
Notify CEC and Registry of Planned Certification Activities	
Conduct Kick-off Meeting With Forest entity	
Plan Certification Activities Based on Forest entity Characteristics	

Core Biological Certification Activities Identify Potential Emission Sources/Carbon Pools	Task Completed	
Review Theme	**Entity Certification**	Project Certification
Check that the certification applies to the entity, a project, or both	☐	☐
Review the reported biological inventory in CARROT:	☐	☐
Confirm the entity's reporting responsibility to the Registry: - Does the entity own at least 100 acres of commercial and/or non-commercial trees? - Has the entity aggregated its GHG data by equity share or management control?	☐ ☐ ☐	

Review Items from Table 3: Inventory and Projections Review A detailed report on Table 3 review items should be submitted to the Registry with this Activities Log		
Review Theme	Entity Certification	Project Certification
Check that the certification applies to the entity, a project, or both	☐	☐
Ownership Maps Review	☐	☐
Description of General Forest Conditions	☐	☐
Description of Existing Stand Conditions	☐	☐
Anticipated Future Management Practices	☐ (Optional)	☐
Baseline Characterization	☐ (Optional)	☐
Typing Methodology	☐	☐
Sampling Methodology	☐	☐
Projections of Future Carbon Stocks and Carbon Calculations to determine Change ($T_2 - T_1$)	☐ (Optional)	☐
Leakage Review	NA	☐

Certification Log for Specific Projects (complete only if a project has been submitted and is being certified)	
All Projects	
If a forest entity opted to use the Registry's "pre-screening" process, review the Project Pre-screening Worksheet and any of the Registry's comments.	☐
Confirm that the project is: - Located in its entirety in the State of California - Secured with a permanent conservation easement - Using native California species (as identified in the CA Department of Fish and Game's "A Guide to Wildlife Habitats of California" - Initiated in year 1990 or later	☐ ☐ ☐ ☐
Confirm that the forest project is one of the three approved project types (conservation-based forest management, reforestation, or conservation).	☐
Review the summary of applicable land use laws that the forest entity provides to you (refer to Annex A of FPP) and confirm that they are complete, and are identified and incorporated into the project baseline.	☐
Discuss with the forest entity how the project baseline was selected and characterized, and assess if the chosen project baseline characterization is accurate/appropriate given the specific forest project baseline criteria, relevant land use laws, and public (and historical) knowledge of the forest project area and its activities.	☐

Confirm that the project activity is additional, that is, the activity practices exceed those outlined in the baseline characterization.	☐
Confirm that the project developer has identified the types of non-biological emissions that result from the project in their non-biological inventory. These emissions do not need to be quantified, just identified. For example, "As a result of a forest project, 5 trucks will be used, hauling equipment will be used, and the lumber mill that is owned by the forest entity will also operate to process the harvested timber."	☐
For Conservation-Based Forest Management Projects	
For conservation-based forest management projects, the forest project baseline must be the C stocks that would result if the project developer was managing its forestland pursuant to the California Forest Practices Act and applicable county level forest management laws and harvesting to the limit permitted by these laws and related regulations. Thus, a successful conservation-based forest management project will produce C stocks that are additional to those that would have resulted to meet all forest management regulations at the time the project is registered in the Registry.	☐
For Reforestation Projects	
Confirm: - Seed zone source for seedlings - Seedling transportation and storage records - Planting instructions and training provided to the labor force planting the trees - Date of planting - Any actions used as follow-up for planting.	☐ ☐ ☐ ☐ ☐
Review the forest entity's statement/documentation/attestation that no statutes/regulations requiring reforestation of the project area exist. Confirm by reviewing existing local land use zoning laws	☐
Review existing practices in project area and any state and county records to confirm project area has been out of forest cover for at least ten years prior to project initiation.	☐
Confirm that reforestation of native species is actually planned (and being implemented).	☐
Check whether there is an intended harvest—at this point the Registry does not permit combined forest projects, so reforestation projects cannot include harvest at this time.	☐
For Conservation Projects	
Review contract/purchase offer documentation for site specific immediate threat conservation projects and assess if the threat is indeed imminent and confirm that the area of forestland would be lost if the development ensued; or	☐
If the project is dependent on county and state land use trends, review and confirm the most recent state and county local land use data to determine the rate of land use change for ongoing conservation projects.	☐
Completing the Certification Process	**Date Achieved**
Prepare a Detailed Certification Report (including biological and non biological emissions) & present to forest entity	
Complete the Biological Emission Inventory Certification Activities Log & present to forest entity	
Complete the Non-biological Emission Inventory Certification Activities Log & present to forest entity	
Prepare a Certification Opinion for the entity's biological emissions & present to forest entity	
Prepare a Certification Opinion for the entity's non-biological emissions & present to forest entity	
Conduct Exit Meeting with forest entity to discuss Certification Report, Opinion, and Logs	
Submit Authorized Certification Opinions and Certification Activities Checklists to the Registry	
Provide Certification Records to Client for Retention	

ANNEX 3. Certification Opinion for a Forest Entity

Annex 6

California Climate Action Registry

Certification Opinion: Forest Entity

Name of Certifier _____

This is to attest that _____ 's biological inventory in California has been reviewed for the period covering _____to _____, and has been certified according to the California Climate Action Registry's Forest Certification Protocol against the standards set forth in the Registry's Forest Sector Protocol.

Certification Opinion

_____ Certified without Qualification

_____ Unable to Certify

Baseline

_____ Year, if specified

Attestation

_____ _____
Lead Certifier Date

_____ _____
Senior Internal Reviewer Date

Authorization

I _____ authorize the above named certifier to submit an electronic version of this Certification Opinion to the California Climate Action Registry via CARROT.

_____ _____
Forest entity Name Date

ANNEX 4. Certification Opinion for Forest Projects

California Climate Action Registry
Certification Opinion: Forest Projects

Name of Certifier _____

This is to attest that _____ 's forest project in California has been reviewed for the period covering _____to _____, and has been certified according to the California Climate Action Registry's Forest Certification Protocol against the standards set forth in the Registry's Forest Project Protocol.

Certification Opinion

_____ Certified without Qualification

_____ Unable to Certify

Baseline

_____ Year, if specified

Project Type

_____ Reforestation

_____ Conservation-based forest management

_____ Conservation

Attestation

_____ _____
Lead Certifier Date

_____ _____
Senior Internal Reviewer Date

Authorization

I _____ authorize the above named certifier to submit an electronic version of this Certification Opinion to the California Climate Action Registry via CARROT

_____

Project Developer Date