

Document Approval Process

Wireless Innovation Forum

Policy 001

Version 3.1.0

As approved by the Board of Directors on 8 March 2018



Scope

This policy describes procedures for submission of documents to the Wireless Innovation Forum (WInnForum) for consideration, deliberation, and adoption as technical specifications, technical reports, recommendations, and information.

Rationale

This document proposes how the WInnForum should henceforth assess submitted contributions and how they should be analyzed and published. It addresses the need for rigorous process adherence and unquestionable fair-handedness expected by industry at large. Such a process is also essential to support our interaction with other industry bodies and standards organizations.

Among the attributes desired for an WInnForum process are:

- a) Rigorous specification of form and content for document submission
- b) A defined review and progression process mediated by checks and balances of "working groups", committees, and steering committee, and chairs
- c) A well defined process for elevating differences of opinion for resolution
- d) Sufficient industrial review, participation, validation
- e) Opportunity for alternative standards, and performance contrasts
- f) Traceability of each version, and annotated responses accommodating all recommendations; rigorous record keeping
- g) Alignment with the processes of other key standards bodies within the wireless telecommunications community, such as ETSI

In the many years since its inception, a substantial body of work has been accomplished and published in the WInnForum. A significant benefit provided to Forum members by the organization has been a venue for discussion of technical, market and regulatory issues. Competing companies have been able to discuss the technology, and arrive at consensus agreements that avoid product differences introduced solely because they have been developed by engineering organizations without a means to communicate and compromise.

This policy describes procedures that provide the formality and accountability necessary in these deliberations. It also describes the infrastructure to support the mechanical details of implementation in a more structured way. The policy represents an update to the original Technical Committee Process that was developed and approved in 2001 (WInnForum-01-I-0013-V3.2). That process was revised in the form of SDR Forum Policy 001, which was approved by the Board of Directors on 4 September 2006. The revision provided for a better defined and more rigorous process for the introduction, maturation, and promulgation of documentation and other work products and applied to the work products of all committees. The modifications made in the second iteration of the document (27 January 2009) were largely editorial, and were made to:



- 1) Align this process with the project approval process approved by the Board of Directors on 1 February 2008
- 2) Clarify sections that have been flagged as ambiguous by various WInnForum members
- 3) Grant the Chair of the Forum the authority to reduce the ballot cycle for committee ballots under special circumstances

The modifications made in this iteration of the document are more structural to better support commercialization of technologies following the Forum's Lean Standards Development ModelTM, which speeds the development process considerably compared to other standards organizations: Changes are as follows:

- 1) Align with the revised Forum structure to include "Commercialization Committees" as approved by the members in 2013.
- 2) Updates to the Document Designations
- 3) Inclusion of Interim and Incremental Release Process
- 4) Committee Branding
- 5) Updates to the Fast Track Process
- 6) Updates to Configuration Management Process





Contents

1	INTRODUCTION	1
2	WINNFORUM DOCUMENT TYPES	1
	2.1 WINNFORUM TECHNICAL SPECIFICATION DOCUMENTS (TS)	1
	2.2 WINNFORUM TECHNICAL REPORTS	2
	2.2.1 Technical Reports (TR)	2
	2.2.2 Market Reports (MR)	2
	2.3 WINNFORUM RECOMMENDATIONS (RC)	2
	2.4 INFORMATION DOCUMENTS (IN)	3
	2.5 INPUT CONTRIBUTIONS (I)	4
	2.6 HISTORICAL DOCUMENTS (HS)	4
3	WINNFORUM DOCUMENT APPROVAL PROCESS OVERVIEW	5
	3.1 WINNFORUM DOCUMENT LEVELS OF MATURITY	7
	3.1.1 WInnForum Submission	7
	3.1.2 WInnForum Draft	7
	3.1.3 WInnForum Proposal	
	3.1.4 WInnForum Release	
	3.2 Comments	7
	3.3 INCREMENTAL RELEASE	8
	3.4 WINNFORUM DOCUMENT APPROVAL PHASES:	8
	3.4.1 Admission	8
	3.4.2 Development/Coordination	8
	3.4.3 Proposal for Promotion	9
	3.4.4 Last Call	9
	3.4.5 Balloting	9
	3.5 PROTESTS AND APPEALS	. 10
	3.6 JOINT DEVELOPMENT WITH OTHER ORGANIZATIONS	. 10
4	WINNFORUM PROCESS DETAILS	. 11
	4.1 WINNFORUM SUBMISSION	
	4.1.1 WInnForum Submission: Admission	. 11
	4.1.2 WInnForum Submission: Development	. 13
	4.1.3 WInnForum Submission: Proposal for Promotion	. 13
	4.1.4 WInnForum Submission: Last Call	. 13
	4.1.5 WInnForum Submission: Balloting	. 13
	4.2 WINNFORUM DRAFT	
	4.2.1 WInnForum Draft: Admission	. 14
	4.2.2 WInnForum Draft: Development	
	4.2.3 WInnForum Draft: Proposal for Promotion	
	4.2.4 WInnForum Draft: Last Call	. 15
	4.2.5 WInnForum Draft: Balloting	



	4.3	WINNFORUM PROPOSAL	16
	4.3.1	WInnForum Proposal: Acceptance	16
	4.3.2	\mathbf{I}	
	4.3.3	8 WInnForum Proposal: Proposal for Promotion	17
	4.3.4	WInnForum Proposal: Committee Last Call and Committee Ballot	17
	4.3.5		
	4.3.6		
	4.3.7		
	4.3.8	1 0	
	4.4	WINNFORUM RELEASE	
	4.4.1	Release Branding	19
5	DOG	CUMENT MANAGEMENT	20
	5.1	INPUT CONTRIBUTIONS	20
	5.2	DOCUMENT NUMBERS FOR RELEASED DOCUMENTS	
	5.3	DOCUMENT NUMBER FOR DOCUMENTS IN DEVELOPMENT	
6	DOO	CUMENT TRACKING PROCEDURE	22
	6.1	INPUT CONTRIBUTIONS	22
	6.2	RECOMMENDATIONS, REPORTS, AND SPECIFICATIONS	
7	CON	NFIGURATION MANAGEMENT	26
	7.1	PURPOSE	26
	7.2	DECISION TO PLACE A WINNF SPECIFICATION UNDER THIS POLICY	26
	7.3	COLLECTION OF ISSUES	26
	7.4	ARCHITECTURE BOARD	27
	7.5	INSTRUCTION OF COLLECTED ISSUES	27
	7.6	INITIATION OF A REVISION PROJECT	27
	7.7	REVISION PROJECT	28



Procedures

1 Introduction

Work products of the WInnForum are generally distributed in the form of documents. This process describes the procedures to be followed as the WInnForum generates and approves those documents.

The goal of this document is to provide a process that can apply to all groups creating work products within the WInnForum. This includes Work Groups, Special Interest Groups, Task Groups, Ad-Hoc Groups, etc. as they are formed. Three terms are used throughout this document as a generic term representing any WInnForum group that is developing a work product. The terms are: 1) Working Group, 2) "work groups" or 3) "working groups" in quotes. Committee is used as a generic term to define one of the WInnForum Committees as appropriate.

2 WInnForum Document Types

The WInnForum generates a number of different document types. The document types managed by this policy are:

- Technical Specifications
- Reports
 - Technical Reports
 - Market Reports
- Recommendations
- Information Documents
- Input Contributions
- Historical Documents

The documents are explored in additional detail in the sections below.

2.1 WInnForum Technical Specification Documents (TS)

Specifications provide, in a complete, precise, and verifiable manner, the requirements, architecture, protocols or other characteristics of some architectural element of a wireless system. After approval of an WInnForum Specification it can be positioned in the industry as a "voluntary standard." A voluntary standard is a standard announced to the



public by a not for profit industry group which allows open company/agency membership for its development. It is voluntary in that there are no legal or otherwise binding requirements in the adoption of a voluntary standard. Industry compliance is based on cooperation followed by competition. It is better to cooperate in developing a voluntary standard to quickly form the foundation for rapid industry growth; and then, once the standard is in place, compete with industry players for a share of the market.

Technical Specification documents are identified with Document Category Identifier TS.

2.2 WInnForum Technical Reports

Reports are used by the Forum as informative documents, and are classified by the Forum follows:

2.2.1 Technical Reports (TR)

Technical Reports formally present a technical topic relevant to the Forum's mission. Technical Reports may be used as a precursor to developing a Technical Specification, or provide guidance on how to implement an existing specification. The purpose of a Technical Report reports is not to make recommendations or to specify a technology, but rather to explain the "how and why" of some technology or process, and to identify and define any associated issues. Technical Reports may include RF environments, requirements, designs, test results, architectures, operational concepts, technology advancements or other similar types of information regarding wireless technology.

Technical Report documents are identified with Document Category Identifier TR.

2.2.2 Market Reports (MR)

Market Reports present the current state of a topic relevant to a specific market. Such reports may include market needs, use cases, market analysis, impact of regulations other similar types of information regarding a relevant wireless market.

Market Report documents are identified with Document Category Identifier MR.

2.3 WInnForum Recommendations (RC)

Recommendations are documents provided by the Forum to other organizations, such as the US Federal Communications Commission, the European Telecommunications Standards Institute, the International Telecommunications Union, or the Joint Tactical Networking Center, to provide guidelines or opinions. These can include, for example, a suggestion to adopt, or not adopt, some policy or practice, or can provide advice on the applicability of certain technologies in addressing another organization's needs. Recommendations are primarily intended to influence the decisions of these other organizations on behalf of the Forum's member companies. Like Specifications and Reports, Recommendations must generally go through the complete document release process. However, given the often time sensitive nature of these types of documents, specific Recommendations may be selected by the WInnForum Board of Directors to be "Fast Track" documents. Fast track documents may, at the discretion of and with approval by the committee chair, bypass procedures prior to CP6 (Forum Balloting) to meet with a specific suspense date, and should time require, may be voted on directly by the Board of Directors in lieu of a full plenary vote. The Board of Directors has delegated responsibility for approval of regulatory filings under the Fast Track process to the Forum Chair, requiring that the Chair report such approvals to the Board of directors for inclusion in the minutes of the next Board meeting following the approval.

Recommendation documents are given the designation RC.

2.4 Information Documents (IN)

Information documents are items that are intended solely for informational purposes. They are published for the general information of WInnForum members, and are not considered WInnForum work products. The Information designation is intended to provide WInnForum members access to a broad range of documents from many sources, subject only to editorial considerations and to verification that there has been adequate coordination with the document approval process.

Information Documents can be originated by persons outside the WInnForum, but must be sponsored by at least one member company to be accepted by the Forum for publication. These documents can also be recommended studies to be developed by WInnForum Committees. After initiation of the document, it could be later decided to advance as a Report, Technical Specification or Recommendation.

Information Documents may be original work. Or they have been published elsewhere. If they have been published elsewhere, they do not become copyright by the WInnForum, but respect all of the copyrights of the original publisher. This material is normally made available at WInnForum meetings to all participants; however Information Documents may be designated as Member's Only documents and will be treated accordingly. Information documents that contain material protected by patents are subject to the WInnForum Intellectual Rights Policy (WInnForum Policy 007).

Specifications that have been prepared outside of the WInnForum and are not incorporated into the WInnForum Recommendations or Reports Documents may be published as Information documents, with the permission of the owner and the concurrence of the Chair of the WInnForum.

The WInnForum serves only as a distributor of this material, and will retain a file copy so that additional copies can be provided to members. Because this material is not subject to any of the provisions of the WInnForum Document Approval Process, they may not be endorsed by the Forum. Information documents will be assigned an WInnForum document number for filing purposes, but will not be subject to tracking or status



reporting. The Publications Manager will be responsible for custody of Information documents and will assure respect of the IP rights of others.

Information documents are identified with Document Category Identifier IN.

2.5 Input Contributions (I)

Input contributions are submissions made to the Forum for the express purpose of being included in a report, recommendation or technical specification. Input contributions are member only and are subject to the WInnForum Intellectual Rights Policy (<u>WInnForum</u> Policy 007).

Input contributions are identified with Document Category Identifier I.

2.6 Historical Documents (HS)

There are a number of reasons that a publication may lose its status of being a current document, including replacement by a current version, rejection by a vote, or inactivity by the sponsoring "work group" for the designated expiration time period.

When such events occur, the item under consideration will be evaluated by the Sponsoring "Work Group" (or committee) and will be considered for depreciation to become a Historical document by the Sponsoring "Work Group" and committee. Depreciation of a document requires balloting at the plenary level, although the Chair of the WInnForum may choose to promote a document for balloting for depreciation, at the recommendation of the committee chairs, without requiring further process. The original document number will be retained, but with the Document Category Indicator changed to H.

Historical documents are identified with Document Category Identifier HS.



3 WInnForum Document Approval Process Overview

The WInnForum Documents Approval Process applies both to Documents that are intended for release to the public by the WInnForum and also those documents that are not intended for release to the public. At each stage in the maturation process, referred to as a control point, the document proceeds through an evolutionary cycle.

There are six major goals for the process:

- Formalize the mechanism by which any member can propose an item for endorsement by the WInnForum and release to the marketplace at large.
- Provide an opportunity for any member having a stake in the content of an item to influence the positions taken before it is formally adopted by the WInnForum.
- Provide a way to identify the current status of a work item and the work plan for further maturation.
- Identify the originator of an item, define the role of any other parties with a degree of sponsorship, and indicate the WInnForum "Work Group" that has sponsorship of the item (document). And as such, the Chair of the Sponsoring "Work Group" has management responsibility for maturation of the item (document).
- Provide an archival record of the process through which an item matures. This will include all versions of the item, the comments on each, responses to the comments, and the dates on which all actions on the item took place.
- Provide a framework so that different sizes of task groups may develop documents (single person to large groups). And provide a framework so that work groups can develop different documents based on the objectives of the particular committee they represent; thus market reports, regulatory comments/reviews, concepts of operation, technical architectures, etc. could be developed under this documents approval process. This freedom of development of documents can be applied to ad hoc committees and to existing or new WInnForum committees; and the document approval process is applicable to all WInnForum documents.

The process is summarized in Figure 1. There are a series of maturity levels, defined at the present from WInnForum Draft Submission through WInnForum Release. At each level there are defined phases, from admission to balloting, which must be accomplished.



They will normally be done sequentially, but may be taken out of sequence if circumstances indicate.



Figure 1: Activity Diagram of the WInnForum Document Release Process

3.1 WInnForum Document Levels of Maturity

Documents are generally developed within the WInnForum as a part of a work project that has been approved by the WInnForum Project Approval Committee, as defined in the WInnForum Project Approval Process (<u>WInnForum Policy 002</u>).

The Stages along the Document Approval Track are:

3.1.1 WInnForum Submission

The document is developed by an WInnForum member organization and submitted to the WInnForum for consideration and promotion. Documents developed within the "working group" may skip this phase, and documents submitted as input contributions only ("I" documents) are never promoted beyond this phase.

3.1.2 WInnForum Draft

Document Submissions have been accepted, the project to mature the document has been approved, the format of the document (Report, Technical Specification, Recommendation) has been defined, the document has been developed by a Sponsoring "Work Group".

3.1.3 WInnForum Proposal

The document developed by the Sponsoring "Work Group" has been balloted at the Sponsoring "Work Group" level, and has obtained the Sponsoring "Work Group" Approval. The document is submitted to the appropriate Committee.

3.1.4 WInnForum Release

Documents has been accepted by the Committee chair, balloted and approved at the Committee level, and accepted for publication by vote of the eligible WInnForum membership. After this approval, the document is promoted to an WInnForum Released Document, with the appropriate designation.

Released technical specifications are designated as a voluntary standard and may be submitted to a National or International standards organization for further standardization. Processes for promotion beyond the Released state are not defined in this document.

3.2 Comments

During the process of deliberation on a document under consideration there are normally a number of changes of language. Prior to balloting at the Committee level, these changes may be entered as markup in the primary document using a "track changes" function of the document editing tool or they may be submitted separately. The document



champion may convert to a new version number as appropriate. The comments/proposed changes are gradually worked off to arrive at a document that has consensus from the "work group." In order to retrieve earlier comments, they are stored by the document champion because he has stored earlier versions of the document.

When comments are developed for a document that has not been approved for public release, the comments may be limited to WInnForum "working group" members and WInnForum members (see Section 5.3).

During balloting to promote a document from WInnForum Proposal to WInnForum Release, a separate set of comments will be collected by the Publications Manager. These comments will clearly define what portion of the base document is to be changed and should suggested substitute language. The convenience of the document editor should be considered by making insertion of the new material into the existing document as simple as possible.

3.3 Incremental Release

The WInnForum has adopted an incremental release process to allow for the rapid revision of existing standards:

- Major release: All elements of the document are eligible for ballot.
- Technical Revision: A small number of changes or revisions are made to an existing technical specification, and only those changes or txt impacted by those changes are eligible for consideration in the ballot process.
- Editorial Revision: Minor typo's or grammatical errors are corrected without the need to reballot. Such changes may be made by staff with the approval of the Forum Chair.

Designation of whether a modification to a Technical Specification constitutes a major release or a Technical revision shall be made by the Committee Chair prior to balloting.

3.4 WInnForum Document Approval Phases:

The following Phases are used at each Level of Maturity within the process.

3.4.1 Admission

Admission is the step where a document is accepted for work effort to mature it to a higher maturity level. As part of this phase the Sponsoring "Working Group" chair with reporting responsibility is identified.

3.4.2 Development/Coordination

In this phase detailed consideration of the document is made. Changes may be made by the originator, or submitted as comments by others. This phase may take an extended



period of time if a large number of revisions are proposed, or it can be executed very quickly if there is consensus that the criteria for promotion have been met.

3.4.3 Proposal for Promotion

For each level of maturity, a sponsored "working group" level is specified. When that "working group" is satisfied with the work effort, they prepare to submit it to the next higher stage (stages shown in section 3.1) with a Proposal for Promotion. The submitting working group chair collaborates with the receiving level Chair (Technical, Marketing, Regulatory, etc.) to bring the document up for consideration. It is incumbent on those involved to "socialize" the proposal with Forum members at appropriate levels to identify any unresolved issues prior to submittal.

3.4.4 Last Call

Prior to promotion there is a time period when the document is made available for consideration. The Sponsoring Chair controls the Last Call process, and Last Call may be concurrent with Balloting.

Comments received during Last Call must be evaluated by the Sponsoring Chair, and three options are possible:

- 1) If comments are out of scope for the incremental release, they may be rejecteded by the Sponsoring Chair. The document can then be promoted without requiring recirculation.
- 2) If only minor changes and typographical edits are received, these may be made on the fly. The document can then be promoted without requiring recirculation
- 3) If substantive comments are submitted, and the Sponsoring Chair determines that these comments must be resolved before the Proposal for Promotion is accepted, then the document must be returned to the "working group" for resolution of the comments. Disposition of comments generally involved coordination with the comment source and can be as follows:
 - a. Accepted by the "working group"
 - b. Accepted with modification by the "working group"
 - c. Rejected by the "working group", with approval of the Sponsoring Chair
 - d. Withdraw by the source after further discussion with the "working group"

If all substantive comments are rejected, then the document may be advanced by the sponsoring chair without recirculation. Otherwise, once the comments are resolved, the process repeats until the Proposal for Promotion is accepted.

3.4.5 Balloting

Balloting requirements are specified for each Stage. **Balloting at all stages is limited to WInnForum Members only**. Eligibility for balloting at the work group level or below will be set by the approved work group policy, and may be limited to only active work group members. For balloting at the Committee or Plenary level, each eligible



WInnForum member organization casts a single vote following the procedures defined herein. If several representatives from a member organization are present, they may caucus to determine their organization's vote.

3.5 Protests and Appeals

This entire process is intended to strengthen and expedite the work of the WInnForum. It is subject to review by the WInnForum Board of Directors. They may revisit any decision made under the process, or revise the process.

Disapproval of a document can be appealed to the WInnForum Board of Directors. Protests relating either to approval or disapproval of a document are adjudicated by the WInnForum Board of Directors, and their decision will be final. If they so choose, they may reinstate any document into the standards process at the level they choose, and with whatever comments they choose, for reconsideration.

3.6 Joint Development with Other Organizations

Through our liaison activity, the Forum may be involved with the document development process of other organizations. In this case, three scenarios are envisioned:

- 1) The Forum develops a formal input to the other organization as a member of that organization. This input would need to follow the process for creating an approved document outlined in this process
- 2) The partner organization provides input to the Forum as a member. In this case, the document will be assigned an information document number and will be treated under the rules of membership. This will likely mean the document will be protected as "WInnForum Members Only"
- 3) The Forum may jointly develop a document at the working level with the other organization that will be jointly released, in whole or in part, by the 2 organizations.

In the latter case, the memorandum of understanding between the two working groups should clearly align the processes to be followed by the two organizations. At a minimum, the process should allow for multiple drafts of the document to be jointly developed between the two working groups without formal balloting by either group. Once the joint document is stable, the document should be balloted through both organization following there respective processes. Should comments occur during the balloting at any stage by either organization that could materially affect the balloting of the other organization, a mechanism must be provided to allow for this feedback.

The WInnForum's full policy on sharing documents between organizations can be found at <u>http://www.wirelessinnovation.org/policies_and_procedures</u>.



4 WInnForum Process Details

Each document that is to be published as an item endorsed by the WInnForum goes through defined Levels of Maturity. These Levels can be traversed with varying degrees of formality. Documents that are small in size, limited in scope, or on which there is a wide consensus can be moved quickly through the various stages. For documents where extensive negotiation is required to resolve divergent positions held by members or where coordination is needed with a broad range of interested parties, the process can be executed with a significant degree of formality.

An item on the Document Approval path acquires increasing maturity and status as it progresses. After acceptance as an WInnForum Release the document is available to the market. Prior to that level of maturity it is for use by a limited audience. Once the desired degree of maturity has been reached, it is allowed but not required to move it further through the process.

At any time in the process an item may be withdrawn, or converted to another document type, such as Historical or Information.

4.1 WInnForum Submission

It is the intent of this process to be as open to new submissions as is consistent with good practice. The process is simple for this level so that a Draft Submission can be easily accepted as an WInnForum Draft. A Draft Submission could only be the definition of a document to be generated (either an existing document or original work to be developed). The application of the Process Phases for the WInnForum Draft Submission is recommended as follows, however, the actual process is managed by the sponsoring "Work Group" receiving the draft submission through their internal policies and procedures, unless otherwise specified.

4.1.1 WInnForum Submission: Admission

4.1.1.1 Unsolicited Submissions

Any member or group of members can make a submission at any time by complying with the Admission phase items below. Note that the policy of the WInnForum is that nonmembers cannot directly make an unsolicited submission; instead these submissions MUST be sponsored by one or more member organizations. Admission of a submission normally takes place prior to the meeting at which the submission is to be introduced to provide adequate time for participants to review it. Then the remainder of the process can take place at the meeting, and elevation from submission to draft and consideration of the draft can take place in a single session.

• An Originator, or Champion, must be identified from a member organization. With this role comes responsibility to submit the item, provide the effort needed to promote its admission, respond to comments,



and meet the requirements of this process, including indication of planned disposition of the intended work product when accepted.

- The submission must have an approved cover page with an "I" document number assigned by the Publication Manager.
- The submission must be in an acceptable format, including a soft copy version useable with some widely available software product (e.g. Microsoft Word, Adobe Acrobat with restrictions removed, etc.). A document template is provided by the WInnForum to facilitate this requirement.
- The submission must be accepted by the Chair of a "Working Group" within the associated Committee. Normally an existing Work Group, Task Group, or Sub Group will be used, and a Co-Chair of that group will have authority to commit the group to place it on their agenda. If no appropriate group exists, one may be created by a "Work Group" Chair or the appropriate Committee Chair, with the requirement that the resulting Task Group must gain approval for the resulting project through the Project Approval Committee. The Chair accepting responsibility is then designated the Sponsoring Work Group Chair for the work item, and is responsible for reporting its status and scheduling ballots.
- The submission must support an approved project or be used as a basis for gaining project approval.

4.1.1.2 Solicited Submissions

At the "work group" chairs discretion, the "work group" may solicit input from outside of the "work group." These types of solicitations will come in one of the following three forms. Other forms of solicitations can be proposed to the committee chair for review and utility. A variety of types of documents can be pursued by this document approval process.

- Request for Market Information (RMI) A request for market information is used to solicit information from industry. It will generally take the form of a market survey and may be used to, for example, survey available COTS technologies available in the market or to explore best practices in the development of wireless technology. RMI's may have broad industry distribution, including soliciting information from outside of the Forum. In releasing an RMI, the "work group" itself will act as the originator, and the results of the RMI will generally be encapsulated by the "work group" in an WInnForum Report following the Forum's standard process.
- Request for Information (RFI) a request for information can be a collection of information for general use by the Forum or is sent as a predecessor to a request



for proposal and is used to solicit information from industry that will be used in preparing a request for proposal. Like RMI's, RFI's may have broad industry distribution, with the "work group" itself acting as the originator.

• Request for Proposal (RFP) – RFPs are issued to solicit submissions that will act as proposed draft standards. RFP's are generally distributed to member companies only, but may at the discretion of the associated Committee chair be distributed to other organizations through which the WInnForum has a formal relationship. RFP's may, at the discretion of the "work group" chair, require a letter of intent be submitted by companies that plan to respond to the RFP at an appropriate date preceding the submittal of the proposal. A representative from the company submitting the proposal response will act as the originator/champion in the context of the WInnForum process moving forward.

The release of an RMI, RFI, or RFP does not require full WInnForum approval, but instead will occur following the standard WInnForum process through control point 5. Information received from RMI's, RFI's, and RFP's will be available only to "work group" members, following the "work group's" and committees working policy, and will be protected accordingly. This allows the "working group" and committee to establish through their policies whether they will solicit inputs from "members only" or be more open. For example, the Protocols Work Group, as a body producing standards track documents may decide that received information will be treated as "members only". The Advocacy Work Group, as a body producing market reports, may decide to be more open.

4.1.2 WInnForum Submission: Development

The Originator gives to the designated group the rationale behind the item and presents a brief introduction to it. Because "working group" energy is a scarce resource, it is appropriate to discuss the relevance and importance of the proposal. Changes may be made to the document at this point, but they should be limited to non-technical considerations such as title, intended disposition, format, and typographical changes.

4.1.3 WInnForum Submission: Proposal for Promotion

After discussion, the item is proposed for promotion from Draft Submission to Draft. This step is equivalent to calling for the question in parliamentary procedure.

4.1.4 WInnForum Submission: Last Call

This is a call by the Work Group Chair for agreement to ballot. No time delay is required, but consideration of the item may be deferred at this point rather than proceeding with a formal ballot.

4.1.5 WInnForum Submission: Balloting

Balloting to accept the submission into the work group is performed according to the Sponsoring Work Group internal policies and procedures.



<u>Control Point 1</u>

Submission is made by the Document Champion Sponsoring "Work Group" evaluates the Submission Submission is accepted as input in support of an approved project Committee Chair is notified in writing

4.2 WInnForum Draft

The next process level contains the work required to mature the Draft to an WInnForum Proposal. This is the level at which documents undergoing development spend the most time. While a draft reflects the position of one or a few members, the result is a negotiated position that represents a formal position of the entire Sponsoring Work Group membership.

4.2.1 WInnForum Draft: Admission

Admission in the Draft stage represents the beginning of the development of a Recommendation, Report, or Specification in support of an approved project. Admission may be based on one or more WInnForum Submissions, or may start from scratch as a "work group" development. A document template is available from the WInnForum should the "work group" choose this latter path.

During this phase of the Draft Level, the policies and procedures for maturing the document by the "work group" must be established, to include voting eligibility. Draft policies and procedures are provided by the WInnForum for consideration.

Once the project is initiated, the Sponsoring Work Group Chair must register the document with the Publication Manager following the procedures defined in Section 6. At this time a document number will be assigned to the document under development. In addition, online facilities may be established in the WInnForum's group portal to facilitate development, including setting up private file sharing facilities, discussion Forum's, and email reflectors supporting the group.

<u>Control Point 2</u>

Project is initiated by the Sponsor Chair Policies and Procedures are Established Document is "Registered" with Publications Manager Document number assigned (used for new document)

4.2.2 WInnForum Draft: Development

This is the phase where detailed consideration of the proposed work item takes place under direction of the Sponsoring Work Group Chair. The structure and the policies of



the Sponsoring Work Group manage the Document development task through control point 3. Interested parties carefully review the document on a paragraph by paragraph basis. The process to be used is not specified, but the object is to negotiate and rework the item until consensus is obtained.

The conclusion of the development phase requires that the document to be in its final "Draft" form, including pre-pending required cover pages and material as defined in Section 5. The document should be a stand-alone document, with the document style, numbering scheme, etc. approved by the Publications Manager, and the "work group" may choose to utilize WInnForum Document Editor to reach this mature state.

4.2.3 WInnForum Draft: Proposal for Promotion

This step is in preparation for moving it out of the "working group," and is reported to the Committee Chair in writing. To be proposed for promotion, the "working group" must agree to end development, and the document must be stable, with changes and corrections complete. The Proposal for Promotion then is accepted by a majority vote of the members present with one vote per eligible "work group" member.

At this point the document begins to move from a group of participants who have detailed understanding of the proposal to the rest of the Forum membership. Consideration should be given to developing presentations and other tutorial materials that help the more general audience understand the work product.

Control Point 3

Development work complete, document is stable Voted for promotion by the "work group" sponsoring development

4.2.4 WInnForum Draft: Last Call

The finished work is posted on the group portal, and the "Sponsoring Work Group Chair" issues a "Last Call" via email to the eligible "work group" membership. This Last Call will announce the intention of the "work group" to accept the document, and solicit final comments within a period of three weeks. That time period is intended for detailed technical evaluation by member organizations, and to give them an opportunity to adjust business plans to take the impact of the new material into account. Any comments from typographical corrections to a major objection may be submitted. Based on the results of the Last Call, the Sponsoring Work Group Chair may refer the document back to the "work group" or may proceed with balloting. Last Call may occur be concurrent with Balloting at the discretion of the Sponsoring Work Group Chair.

4.2.5 WInnForum Draft: Balloting

Balloting is done within the Sponsoring Work Group according to their policies and structure. Upon completion of a successful ballot, the document is promoted to an Proposal.



Balloting may occur at meetings of the Forum or by email. The Sponsoring "Work Group" Chair or the Committee Chair is responsible for conduct of the vote. Eligibility for balloting at the work group level or below will be set by the approved work group policy, and may be limited to only active work group members.

Balloting may be done at an WInnForum General Meeting if last call has already occurred. If a ballot is done at a meeting, absent members may designate a proxy to submit their vote. If a vote is not acceptable to any member, a challenge may be submitted for resolution by the WInnForum Board of Directors.

If balloting is done electronically, Last Call may be concurrent with the ballot to streamline the overall process. The electronic ballot should include the document under consideration, the date in which balloting concludes, and the options for balloting. These options are set following the "work group" policies and procedures, however the preferred options are:

- Approve
- Approve with comment
- Disapprove with comment
- Abstain

The Sponsoring Work Group Chair may choose to engage the Publication Manager to facilitate an email ballot at the "work group" level.

<u>Control Point 4</u>

Three weeks elapsed since Last Call "Work Group" Chair initiates ballot Successful ballot at "work group" level Document Configuration Management transferred to the Publications Manager

4.3 WInnForum Proposal

A WInnForum Proposal is a viable document in final or near-final form that has been approved by a Sponsoring Work Group. The process at this level involves coordination with other "Working Groups" across the appropriate Committees and exposure to the entire WInnForum membership for promotion along its designated path.

4.3.1 WInnForum Proposal: Acceptance

Acceptance consists of agreement by the Chair of the appropriate Committee to proceed with the exposure and socialization necessary to garner support for the work from the entire WInnForum. A key element of this activity is sign-off on the architectural coherence of the proposal with other WInnForum Documents, either released or in development, and adherence to the WInnForum Strategic Plan and Roadmap.



<u>Control Point 5</u>

Accepted by Committee Chair Document promoted to Committee ballot

4.3.2 WInnForum Proposal: Coordination

The Development Phase of the Proposal Level requires coordination of the Proposal with all of the Committees, "Work Groups" and relevant Task/Sub Groups to ensure that it is compatible with material that they have published and have under consideration. This assent is accomplished by a survey of those individuals conducted by the associated committee chair. It may be desirable to schedule joint working sessions between "Working Groups" or discussion of the material in a plenary session.

4.3.3 WInnForum Proposal: Proposal for Promotion

To proceed with promotion, the chair of the appropriate Committee must declare that the document is stable, with all changes and corrections complete, and direct the Publication Manager to initiate the Committee Ballot.

4.3.4 WInnForum Proposal: Committee Last Call and Committee Ballot

Balloting at the Committee Level is always done electronically concurrent with Last Call. All WInnForum Member organizations that are eligible to vote, as defined in the WInnForum's Bylaws, may participate in a committee ballot, with each eligible WInnForum member organization casting a single vote. The email ballot will be issued by the Publication Manager and will include the document under consideration, the date in which balloting concludes, the options for balloting, and a sheet for capturing and returning comments. Four weeks are generally allocated for the Committee Ballot to be completed, although the Committee Chair may request the Chair of the WInnForum to reduce the Last Call to a period of not less than 2 weeks for a specific Committee Ballot where special circumstances may apply. Options for balloting will be:

- Approve
- Approve with comment
- Disapprove with comment
- Abstain

The Committee Chair determines whether a consensual or quorum vote is to be used at the Committee Level. A consensual ballot is appropriate when it appears that a consensus exists. For a consensual ballot, the electronic ballot sent by the Publications Manager will clearly state that *no response is considered a vote for acceptance*. If the decision to use a consensual ballot is contested, then a quorum ballot will be used. A quorum ballot requires a quorum of the eligible membership, as defined in the Bylaws, to participate for the ballot to be valid. If more members vote for acceptance than for rejection, the item is approved. Abstentions are not counted. If a quorum is not achieved,



then the document may be re-voted at a later time, or it may be returned to the work group to gain additional support.

Documents that cross multiple committees must be balloted separately in each committee, with comments resolved collectively by the committee chairs. Upon completion of a successful ballot, the Committee Chair notifies the WInnForum Chair that the Document is ready for final ballot.

<u>Control Point 6</u>

Committee Balloting complete Forum Chair notified that the document is ready for Plenary Ballot

4.3.5 Interim Release

The Interim Release Process allows a document to be developed and balloted incrementally at the Committee level prior to proceeding to a full Forum ballot. Each Interim Release is balloted at the Committee level, with the results automatically returned to the Work Group for consideration in preparing the next Interim Release. An Interim Release may be used as a way to collect comments through the Committee ballot process on parts of a larger document under development, or may be used to collect public comments on a document for consideration prior to moving to a full release. Accordingly, and Interim Release may be fully public or members only at the designation of the Committee Chair.

4.3.6 WInnForum Proposal: Presentation

The final step is to present the Document to the entire WInnForum as a way to explain the essence of the document and promote an understanding of the impact it may have when issued. The Plenary presentation may be made by the Committee Chair, the Sponsoring WG chair, or a champion of the work done. The key is to make sure the entire organization understands and supports publication.

4.3.7 WInnForum Proposal: Last Call

The Last Call will normally be made at an WInnForum Plenary session, with announcement that a ballot will be conducted at a later Plenary, with at least 24 hours elapsed between sessions. This delay is to allow any member to refer the work back to their internal organization for a final review, and to lobby for or against the proposal with other members.

Alternatively, last call may be issued via email, with one weeks notice given prior to the Plenary Session where the ballot will occur.

4.3.8 WInnForum Proposal: Balloting

The Ballot is a vote of the entire membership, one vote per member. After a successful ballot, the document is promoted to an WInnForum Release. The Forum chair will determine the type of ballot (consensus or quorum) and the Forum chair will determine



the percentage approval required for a successful consensus ballot. Promotion of an Proposal to an WInnForum Release is an important step and as such it is incumbent on the Forum not to publish as a Report, Recommendation or Specification work that is not ready to be implemented.

As all comments should have been resolved at the Committee level, Plenary Ballots are generally up/down votes with no additional comments allowed. Should the Forum Chair wish to accept comments, or should schedule prohibit a live vote, the Forum Chair may choose to initiate a Plenary Ballot electronically. Should this occur, the Publication Manager will initiate the Ballot following the same procedures as defined for the Committee Ballot with a minimum period of 1 week for responses to be received.

Control Point 7

Plenary Presentation made 24 hours since Last Call Successful Plenary ballot

4.4 WInnForum Release

A WInnForum Release is a document ready for public distribution. Documents may be released as Specifications, Reports, or Recommendations, and will be provided by the WInnForum to the community in general.

Detailed procedures beyond this level are not currently defined.

4.4.1 Release Branding

At the discretion of Committee Chair, a WInnForum Report, Recommendation or Specification may be branded to support the needs of the Committee in promoting the standard. Recognizing that Committees change, but that the Forum has more longevity, the Board of Directors has established guidelines sub-branding as follows:

- Every work product must include the WInnForum branding
- Press releases should have the WInnForum branding, but can include Committee branding
- The Committee branding can build off the main WInnForum branding so long as it doesn't cause confusion for the main WInnForum branding
- Committee branding must include the words "Wireless Innovation Forum Standards" or "WInnForum Standard" in associated text



5 Document Management

This section describes the mechanical details of managing WInnForum Documents. The Publication Manager will be responsible for developing and maintaining this information. All document numbers, data disclosure sections, and formats will be controlled by the Publication Manager.

5.1 Input Contributions

Input Contribution Document Numbers will be in the following format:

WINNF-YY-I-NNNNN-rX

WINNF = The letters **WINNF**, a designator that this is an WInnForum document number.

 $\mathbf{Y}\mathbf{Y}$ = Last two digits of the year of submission.

I = Document Category Identifier

NNNNN = Document serial number, a unique number for each year assigned by the Publications Manager

 \mathbf{X} = the revision on the input contribution

Input contributions must have a coversheet approved by the Forum's legal counsel and the Board of Directors that identifies the source of the contribution and the terms under which it is provided.

5.2 Document Numbers for Released Documents

Release Document Numbers will be in the following format:

WINNF-CC-DNNN-VJ.K.L (Towards VJ'.K') (IRX)

CC = Document Category Identifier

D = **Document** Content Identifier

NNN = Document Serial Number

VJ.K.L = The current Version number, with

- V =the letter V
- J = Current version



- K = Current Technical Revision
- L= Current Editorial Revision

VJ'.K' = The target Version number for the document once approved, with

- V =the letter V
- J' = Target Version
- K' = Target Technical Revision

X= Interim Release Number

Document Category Identifiers are as follows:

- IN = Information documents
- RC = Recommendations
- MR = Market Reports
- TR = Technical Reports
- TS = Technical Specifications
- HS = Historical documents

Document Content Identifier are as follows:

- Legacy = 0
- Requirements = 1
- Architecture and Security = 2
- Protocols and APIs = 3
- Test and Certification = 4
- Operations = 5
- 6 to 9 are reserved for future use

5.3 Document Number for Documents in Development

During development, documents must have a coversheet approved by the Forum's legal counsel and the Board of Directors that identifies the source of the contribution, its purpose, and what steps are required to advance it to the next control point. Documents should also contain terms and conditions as identified in the Forum's Intellectual Property Rights Policy. Once the document has been balloted and approved, the coversheet can be removed, but the terms and conditions must remain.

During development, the document number will be appended with **rM.N** where:

- M = the Control Point
- N = the index of the work document, incremented from 0

6 Document Tracking Procedure

The purpose of this tracking procedure is to describe the actions necessary for documents to progress through the WInnForum's accepted approval. It provides guidance to assist WInnForum members in creating documents and tracking the status of work items. Separate procedures are provided for Information documents submitted to the Forum, and work products developed by the Forum's work groups, special interest groups and task groups for endorsement by the Forum's members.

6.1 Input Contributions

Input Contributions are generally developed outside of the WInnForum and are submitted by member organizations as formal inputs to the Forum. The document tracking procedure for Input Contributions is:

• Phase: Initiation

*Member action*¹: WInnForum Member representatives initiate the document process by sending an email request for a document number to the Publication Manager (PM). The subject line for this email should be "WInnForum Document Number Request" and the body of the email must contain the

- Name of the submitter,
- Title, author, and source of the document,
- Type of document (information)
- Short description of document
- The preferred distribution, as follows:
 - Group Only (please list the appropriate group)
 - WInnForum members only

¹ Note that this action may be waived if an automated numbering scheme is provided by the Forum's online tools



Public release

PM action: Publication manager returns the email with a document number to the requesting member representative (V1.0.0), and information about the document is entered into the Document Tracking Sheet that maintained by the Publication Manager on the Forum's Group Leader portal

• Phase: Submission

Member action: The member representative will fill out the WInnForum approved cover sheet for input contributions with the appropriate data and prepend this cover sheet to the document being submitted. This coversheet can be found on the Forum's member resources page. The final document is then be returned to the Publication Manager for distribution

PM action: Once the Information document is received, the Publication Manager will review the coversheet for accuracy and the document for inappropriate material. If any problems are found the Publication Manager will work with the member representative to resolve them. The Document Tracking Sheet will then be updated to reflect that the document has been received and will be distributed as follows:

- Documents marked as Group Only will be placed on the group portal and be restricted to members of the working group until ready for Committee ballot
- Documents marked as WInnForum members only will be placed on the group portal and will be restricted to members of the Forum
- Documents marked for public release will be placed on the portal until they are approved, at which time they will be released for public access

• Phase: Distribution

PM action: The Publications Manager will post the document on the WInnForum's website in the appropriate area as specified in the distribution request

• Revision/Update

Should the member representative wish to revise the Information document, the version number should be incremented and document should be resubmitted to the Publication Manager with updated instructions.

6.2 Recommendations, Reports, and Specifications

Recommendations, Reports, and Specifications are documents which are developed within the WInnForum's work groups, special interest groups, and task groups under the supervision of the group leader (GL). The document tracking procedure for these types of documents is as follows:



• Phase: Initiation/Admission

GL action: WInnForum group leader initiates the document process by sending an email request for a document number to the Publication Manager. The subject line for this email should be "WInnForum Document Number Request" and the body of the email must contain the

- Name of the principal author,
- Title of the document,
- The state of the document (Control Point)
- Type of document (report, specification, or recommendation)
- Short description of document
- The group (working group or special interest group or task group) for whom the document is intended.

PM action: The Publication manager will return a document number to the requesting group leader, and information about the document will be entered into the Document Tracking Sheet maintained by the Publication Manager on the Forum's Group Leader portal

• Phase: Development

GL action: The document will follow the approved document template found on the Forum's Document Library page. While in development, the document will be placed on the responsible Group's portal and will be controlled by the group leader until it has been approved by the Group. After the document has been approved by the Group, the GL notifies the Committee chair and the Publications Manager by email that the document has passed the Group level ballot and is ready for Committee ballot. The GL notifies the Publications Manager if a shorter than normal response time is required

PM action: The Publication Manager will update the Document Tracking Sheet to reflect that document has reached this stage of the process; the PM will also modify the document number.

• Phase: Coordination

Committee Chair action: The Committee Chair initiates and conducts the coordination phase of the process in the responsible committee.

PM action: The Publication Manager will review the document to ensure it is in an appropriate format and has the required cover materials. If any problems are found the Publication Manager will work with the Committee Chair and Group Leader to resolve them, including utilizing the WInnForum's document editor as required.

• Phase: Committee ballot

Committee Chair action: The Committee Chair notifies the Publication Manager



that the Document is ready for ballot, and transfers the document to the Publication Manager via Email.

PM action: The Publication Manager will

- acknowledge receipt of the document, and update the Document Tracking Sheet to reflect the updated status,
- prepare the document for a Committee vote. At this point, the Publication Manager takes over configuration control of the document. Prior to initiating the ballot, the Publications Manager will convert the document to PDF and submit the converted document to the Committee chair for final approval.
- conduct an email ballot or other electronic ballot at the Committee level, or announce to the membership that the document is scheduled to be voted on at a working meeting. Under normal circumstances, the membership will have 4 weeks to consider the document at the Committee level: the email ballot will remain open for 4 weeks, or the document will be circulated for review 4 weeks in advance of a working meeting ("Last Call").
- notify the Committee Chair of ballot results and comments received during the last call or email ballot

Committee Chair action: review the comments and determine the next steps:

- If the document requires minor rework that is editorial in nature, the Committee Chair will notify the Publication Manager of the required changes, and these changes will be made by the Publication Manager and returned to the Committee Chair for approval. Once the Committee Chair approves the changes, the Committee chair will notify the Publication Manager that the document is ready for plenary vote.
- If the document requires substantial changes, the Committee Chair will notify the Publication Manager to return the document to the Group Leader for rework. The Publication Manager then transfer control of the document back to the group and update the Document Tracking Sheet to reflect this change in state.
- If the Committee Chair feels that the document is ready as is, the Committee chair will notify the Publication Manager that the document is ready for plenary vote

• Phase: Plenary Ballot

Committee Chair action: Notify the Publication Manager and the Chair of the Forum that the document is ready for Plenary Ballot,

Publication Manager action: update the version number on the document, update the Document Tracking Sheet to reflect the change in status, and notify the Chair of the Forum that the Document is ready for Plenary Ballot.



Forum Chair action: review the document and if he or she agrees that the document is ready for Plenary Ballot, direct the Publication Manger to initiate the Plenary Ballot. The Chair of the Forum determines the length of the ballot period and the ballot method (email vote or live vote). Under normal circumstances, the membership will have a minimum of 30 days to consider the document at the Plenary level

PM action: if approved by the membership on a plenary ballot, the document is appropriately re-numbered and posted on the WInnForum's website as an approved document. The Document Tracking Sheet is updated to reflect this final change of state

7 Configuration Management

7.1 Purpose

The WInnF releases Specifications in support of Standardization. Usage of those Specifications as Standards implies to establish a long-term configuration management policy for designated specifications.

This section sets the basis for such configuration management policy.

7.2 Decision to place a WInnF Specification under this policy

The decision to place a document under configuration management shall be made by the sponsoring Committee Chair in consultation with the Committee Steering Group.

7.3 Collection of Issues

Issues identified in front of a Specification managed under the current policy will be collected by means of an internet-based Issues collection mechanism.

Any individual identifying himself as a user of the Specification will have the possibility to post an Issue.

The set of information attached to an Issue is at least comprising: names and coordinates of the submitter, organization of affiliation, version of the specification commented, identification of the place in the text where the issue applies, descriptive text of what the issue is and, optionally, proposed direction for resolution, and, optionally, proposed detailed edits for resolution.

No Issue may be posted anonymously.



7.4 Architecture Board

An Architecture Board shall be established by each sponsoring committee, reporting to the Steering Group.

The Architecture Board is specifically entitled to instruct the Issues Collected, through holding of Reviews of Issues, and to advise the Steering Group on related matters, in particular with regards to initiation of Revision Projects and evaluation of backwards compatibility impact of revised versions.

The members of the Architecture Board need to be affiliated with a WInnF member organization, with no derogation possible.

The composition of the Architecture Board will be decided by the Steering Group. In particular, the Steering Group may decide to directly act as the Architecture Board, or decide to create a dedicated group.

7.5 Instruction of Collected Issues

A General Review of Issues of all the collected Issues is realized by the Architecture Board on a quarterly basis.

A Specific Review of Issues can be required by any WInnF member, based on some motivated statement of emergency, with Steering Group evaluating if directing the Architecture Board to make the requested Specific Review of Issue.

Reviews are to provide Steering Group with recommendations on whether a revision project should be initiated to launch revision of a Specification.

Reports of the Architecture Board reviews outcome are distributed to Committee membership.

If and as required, Work Group leaders or subject matter experts may be invited by the Architecture Board to attend a Review of Issues. Any invite has to be affiliated with a WInnF member organization, with no derogation possible.

7.6 Initiation of a Revision Project

Based on the recommendation from the Architecture Board, the Steering Group is to proceed with initiation of a revision project.

A revision project denotes a WInnF project, launched in conformity with the WInnF Project Approval Process, implying submission of a Project Proposal has to occur.



In case the WG having originated the specification is active, the Steering Group will task the WG to identify a Champion and manage the Project Proposal preparation. In case no Champion is identified by the WG or no WG is active, the Steering Group will issue a call for Champion in relation with the Revision Project under consideration.

The list of all Issues to be addressed by the Revision Project is assigned by the Architecture Board to the Revision Project.

The Project Proposal shall explicitly specify if the considered project is limiting its scope to the Issues assigned by the Architecture Board.

A notification that the proposal is under preparation is sent to all submitters of listed Issues, inviting them to join the project when relevant.

Any other aspect of standard WInnF project proposition and approval is applicable, in conformance with the Project Approval Process.

7.7 Revision Project

Upon approval by the project Approval Committee, the Revision Project is executed as any other WInnF Project, with additional dispositions specifically applicable to Revision Projects.

A backward compatibility report needs to be specifically prepared and attached to the Work Group proposal submitted, after a successful Work Group ballot, to for Committee Approval.

Based on the submitted WG-Approved Proposal, the Architecture Board will be tasked to evaluate the Proposal and the backward compatibility report to advise the Steering Group concerning proceeding with the Approval, in light of its backwards compatibility matters mitigation responsibility.

The Steering Group may decide: (i) to turn back the Proposition to WG based on the Architecture Board report, (ii) to proceed with Committee Ballot.