

Generation of Functional User Requirements from Functional User Reviews

Functional User Review Patterns in EBNF to Functional Requirement Boilerplates

Mapping

No.	Review Pattern Code	Functional User Review Pattern	Requirement Boilerplate Code
1.	RP01	<i>rp-01</i> <= <i>someone</i> ("could" "should") ("add" "provide" "offer" "integrate") <i>Activity</i> <i>something</i> <i>Target</i> ;	RB01, RB05, RB06
2.	RP02	<i>rp-02</i> <= <i>someone</i> "would love to" ("see" "use" <i>Activity</i>) <i>something</i> <i>Target</i> ;	RB04, RB05
3.	RP03	<i>rp-03</i> <= <i>someone</i> "thinks" <i>something</i> <i>Agent</i> "would be" MODAL "to have" <i>Activity</i> <i>something</i> <i>Target</i> ;	RB01, RB02, RB04, RB05
4.	RP04	<i>rp-04</i> <= <i>someone</i> "thinks" <i>something</i> <i>Target</i> "should" VERB <i>Activity</i> ;	RB01, RB06
5.	RP05	<i>rp-05</i> <= "Let us implement" <i>something</i> <i>Target</i> ;	RB01, RB04, RB05
6.	RP06	<i>rp-06</i> <= <i>something</i> <i>Target</i> "needs to be" VERB <i>Activity</i> ;	RB01, RB06
7.	RP07	<i>rp-07</i> <= "All that is needed is" <i>something</i> <i>Target</i> ;	RB01, RB04, RB05
8.	RP08	<i>rp-08</i> <= <i>something</i> <i>Target</i> "is what" <i>someone</i> "needs";	RB01, RB04, RB05
9.	RP09	<i>rp-09</i> <= "Could we add" <i>Activity</i> <i>something</i> <i>Target</i> "?";	RB01, RB05, RB06
10.	RP10	<i>rp-10</i> <= <i>someone</i> "thinks" <i>something</i> <i>Target</i> "is" MODAL "to" VERB <i>Activity</i> ;	RB01, RB06
11.	RP11	<i>rp-11</i> <= "Why do not change" <i>Activity</i> <i>something</i> <i>Target</i> "?";	RB01, RB06
12.	RP12	<i>rp-12</i> <= "it would be" MODAL "to" VERB <i>Activity</i> ;	RB01, RB04, RB06
13.	RP13	<i>rp-13</i> <= <i>someone</i> "needs to create" <i>Activity</i> <i>something</i> <i>Target</i> ;	RB01, RB04, RB05, RB06
14.	RP14	<i>rp-14</i> <= <i>something</i> <i>Target</i> "is required";	RB01, RB04, RB05

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15.	RP15	<i>rp-15</i> <= something ^{Agent} "could have" something ^{Target} ;	RB01, RB02, RB04, RB05
16.	RP16	<i>rp-16</i> <= "It would be" ("possible" "beneficial") "to have" something ^{Target} ;	RB01, RB04, RB05
17.	RP17	<i>rp-17</i> <= "Please" ("remove" "check") ^{Activity} something ^{Target} ;	RB01, RB06
18.	RP18	<i>rp-18</i> <= something ^{Agent} "requires" something ^{Target} ;	RB01, RB02, RB04, RB05
19.	RP19	<i>rp-19</i> <= something ^{Target} "should be treated" ("in" "as") something ^{Agent} ;	RB01, RB02, RB04, RB05
20.	RP20	<i>rp-20</i> <= someone "thinks" something ^{Target} "needs" VERB ^{Activity} ;	RB01, RB06
21.	RP21	<i>rp-21</i> <= something ^{Agent} ("should" "could") ("define" "support") ^{Activity} something ^{Target} ;	RB01, RB05, RB06
22.	RP22	<i>rp-22</i> <= something ^{Target} ("should" "could") "be" VERB ^{Activity} ;	RB01, RB06
23.	RP23	<i>rp-23</i> <= "adding" ^{Activity} something ^{Target} ;	RB01, RB05, RB06
24.	RP24	<i>rp-24</i> <= "All" someone "needs is" something ^{Target} ;	RB01, RB04, RB05
25.	RP25	<i>rp-25</i> <= someone "requests" something ^{Target} ;	RB01, RB04, RB05
26.	RP26	<i>rp-26</i> <= something ^{Agent} ("should" "could") "include" something ^{Target} ;	RB01, RB02, RB04, RB05
27.	RP27	<i>rp-27</i> <= something ^{Target} "ought to be" somehow ^{Way} ;	RB03
28.	RP28	<i>rp-28</i> <= someone ("wants" "likes") "to have" something ^{Target} ;	RB01, RB04, RB05
29.	RP29	<i>rp-29</i> <= something ^{Agent} "needs" something ^{Target} ;	RB01, RB02, RB04, RB05
30.	RP30	<i>rp-30</i> <= something ^{Target} "is missing";	RB01, RB04, RB05
31.	RP31	<i>rp-31</i> <= something ^{Target} "is not defined" ^{Activity} ;	RB01, RB05, RB06

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32.	RP32	<i>rp-32</i> <= something ^{Target} "would be a good" ("idea" "thing");	RB01, RB04, RB05
33.	RP33	<i>rp-33</i> <= something ^{Agent} ("can" "could") "use" ^{Activity} something ^{Target} ;	RB01, RB02, RB04, RB05, RB06
34.	RP34	<i>rp-34</i> <= someone "is" ("thinking" "planning") "of adding" ^{Activity} something ^{Target} ;	RB01, RB05, RB06
35.	RP35	<i>rp-35</i> <= "A new" something ^{Target} "can be made";	RB01, RB04, RB05
36.	RP36	<i>rp-36</i> <= "could allow" something ^{Target} "to" VERB ^{Activity} ;	RB01, RB06
37.	RP37	<i>rp-37</i> <= "I propose" something ^{Target} ;	RB01, RB04, RB05
38.	RP38	<i>rp-38</i> <= something ^{Target} ("could" "might") "be not a bad" ("idea" "thing");	RB01, RB04, RB05
39.	RP39	<i>rp-39</i> <= something ^{Target} "would allow to" VERB ^{Activity} ;	RB01, RB06
40.	RP40	<i>rp-40</i> <= someone ("should" "could") "modify" ^{Activity} something ^{Target} ;	RB01, RB04, RB06
41.	RP41	<i>rp-41</i> <= something ^{Agent} ("should" "could") "hold" ^{Activity} something ^{Target} ;	RB01, RB06
42.	RP42	<i>rp-42</i> <= "New changes include" something ^{Target} ;	RB01, RB04, RB05
43.	RP43	<i>rp-43</i> <= ("Plan" "idea" "aim") "is" something ^{Target} ;	RB01, RB04, RB05
44.	RP44	<i>rp-44</i> <= someone "recommends" something ^{Target} ;	RB01, RB04, RB05
45.	RP45	<i>rp-45</i> <= something ^{Agent} ("provides" "supports") ^{Activity} something ^{Target} ;	RB01, RB05, RB06
46.	RP46	<i>rp-46</i> <= someone "should create" ^{Activity} something ^{Target} ;	RB01, RB04, RB05, RB06
47.	RP47	<i>rp-47</i> <= something ^{Target} "is removed";	RB01, RB04, RB05

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48.	RP48	<i>rp-48</i> <= <i>someone</i> "is looking" ("to" "for") VERB ^{Activity} ;	RB01, RB04, RB06
49.	RP49	<i>rp-49</i> <= <i>someone</i> "expects" <i>something</i> ^{Target} ;	RB01, RB04, RB05

Someone grammar structure

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someone-noun <= PROPER NOUN | PERSONAL PRONOUN;
someone <= someone-noun {someone-noun};
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Something grammar structure

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something-noun <= PROPER NOUN | NOUN;
premodifier <= [DETERMINER] [NUMERAL] [ADJECTIVE];
postmodifier-prepositional-phrase <= ("with" | "in" | "on" ) premodifier something-noun {something-noun};
postmodifier-to-infinitives <= "to" VERB;
something <= premodifier something-noun {something-noun} [ postmodifier-prepositional-phrase | postmodifier-to-infinitives ];
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Somehow grammar structure

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somehow <= something VERB [something];
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Functional Requirement Boilerplates

Requirement Boilerplate Code	Functional Requirement Boilerplate
RB01	The <Agent> shall be able to <Activity> <Target>.
RB02	The system shall allow <Target> to be in <Agent>.
RB03	The <Agent> shall be able to <Activity> <Target> with <Way>.
RB04	The <Agent> shall allow a user to be able to <Activity> <Target>.
RB05	The <Agent> shall have <Target>.
RB06	The <Agent> shall <Activity> <Target>.