

Paper pre-preparation

Please fill in the second column.

Element	Fill-in	Notes
Title		The whole paper in a single (max two lines) sentence. What are all key words in your work?
Abstract		All paper in one paragraph. What is your paper about and why is it relevant? Why should the people read/cite your paper? What are the key numbers that you introduce in your paper? Examples: achieved SNDR, BW, antenna gain, FOM... These numbers should be widely accepted figures.
Problem definition		
Problem definition with social relevance (application)		What is the target application? Why is your work relevant for the society? This problem should speak to everyone. Examples: 5G, wireless communication, high data rate, low costs.
Problem definition with scientific relevance		What is the key scientific problem being targeted? This problem should speak to experts in the field. Examples: metastability, jitter, noise, mismatch, wide bandwidth, high linearity, power efficiency, spectrum efficiency, FOM.
Motivation		
Background		What is the minimum knowledge that is needed to understand the paper? What are the basic operational definitions of the concepts that you mainly use in the paper?
Literature study		What is the state-of-the-art? How are the things done today? What are the 2-3 key

		papers that you will use as references? From ISSCC/JSSCC/ISCAS/TACS? What is the widely acceptable benchmark figure in the field?
Possible solutions		What are the possible solutions to the defined problems? Given the alternatives, why is your paper still needed?
Costs		What are the cost functions? Examples: power, area, spectrum
Remaining problems		What problems cannot the cited examples from the literature solve? What is the central trade-off ? Advantages vs Disadvantages?
BODY		
Proposed solution		What is your proposed solution? Is your solution evolutionary or revolutionary? What is the key parameter that your solutions improves?
Assumptions		What are the underlying assumptions in your work?
Novelty		What is the novelty? Why is this novelty useful? How come that no one before has come up with that solution?
Approach		What key figures, plots, tables, numbers, etc. are you going to use in order to convince the reviewer that what you propose is good? Why should the reader trust you? What is the main chain of arguments that addresses the central trade-off ?
Analysis		Can you make your point using mathematics? What is the key equation that you propose and which links the most important parameters in the central trade-off ?
Modelling		How deep is your concept validation via modelling? Numerical (MATLAB)

		simulations, RTL (Cadence block-level architecture with ideal components), transistor level design, layout, measurements? How does your model overlap with the analysis?
Validation		Why should the reviewer trust you? Do your analytical results, numerical simulations and/or measurements overlap or contradict? What are the differences and why? Are there unexpected observations?
Results		Key results? What is the parameter that your work is the best in? Examples: highest speed, lowest power, best FOM, smallest area, highest data-rate.
Limitations		Be honest and comment on the shortcomings of your proposal and your approach. Your goal here is to pre-emptively address the critical remarks of the reviewers.
Comparison with state-of-the-art		How does your work compare with the literature? What figures you are the best in?
Application advancement		What can be enabled by your contributions?
Knowledge advancement		What new knowledge does your paper introduce? How can the scientific society use your paper?
Finish up		
Conclusions		What are the 6 key sentences that you want the readers to remember?
3 key lessons		What are the three key lessons that can be learnt from your paper? What can be learnt from your paper?
Scientific integrity		
Own material		Are the figures, data, tables, text etc. that are used in the paper your own? Were there

		any possible partial copy/paste instances (even accidental)?
Objectivity		Are you fair and objective? Have you considered reasons why someone would not accept your paper?