3rd report

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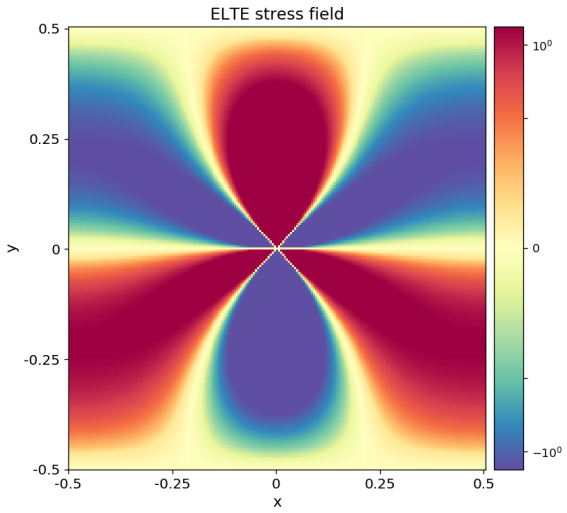
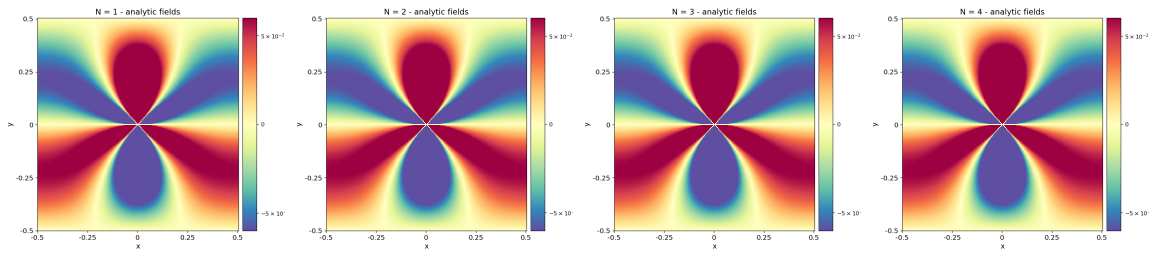
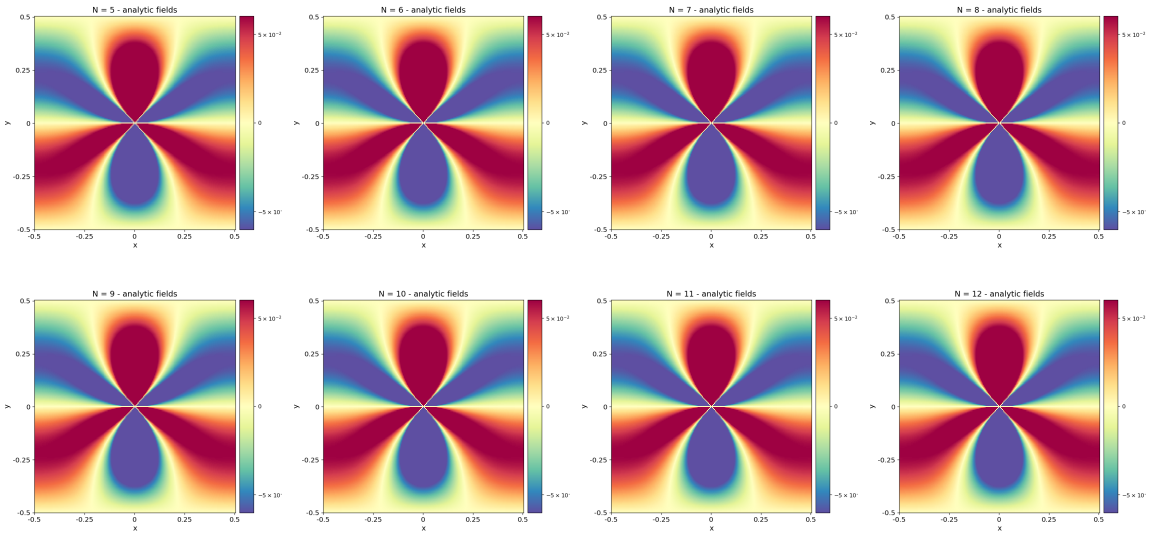
This week I updated my plotting code significantly. I ran the code with different types of fields, such as the stress field code-named ELTE and several analytic fields. The analytic fields only differ in accuracy since they are calculated using N –**WHAT**–.

The ELTE field looks the following way:

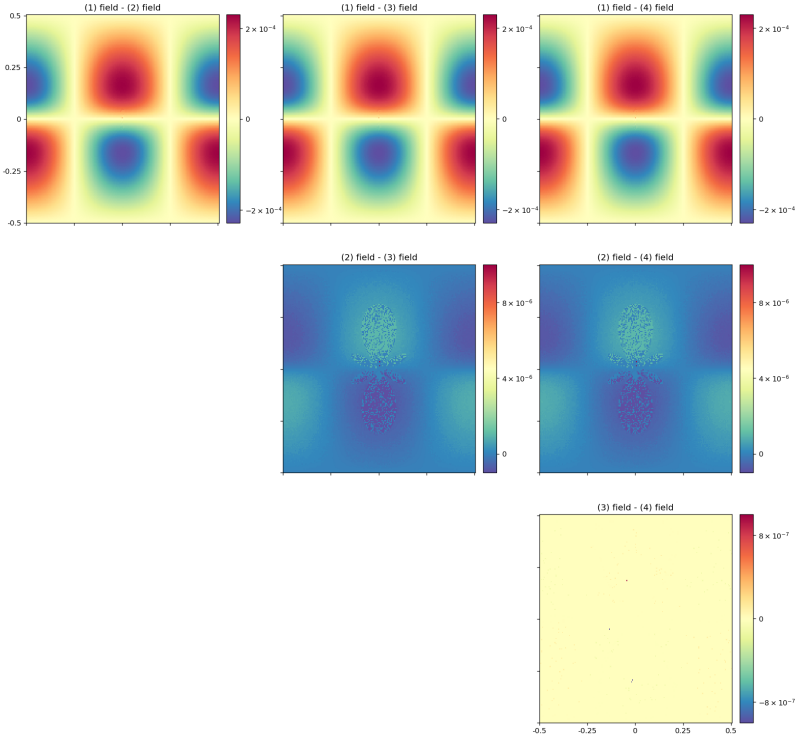


While changing N from 1 to 12 in the calculataion of analytic fields results are the following in order:



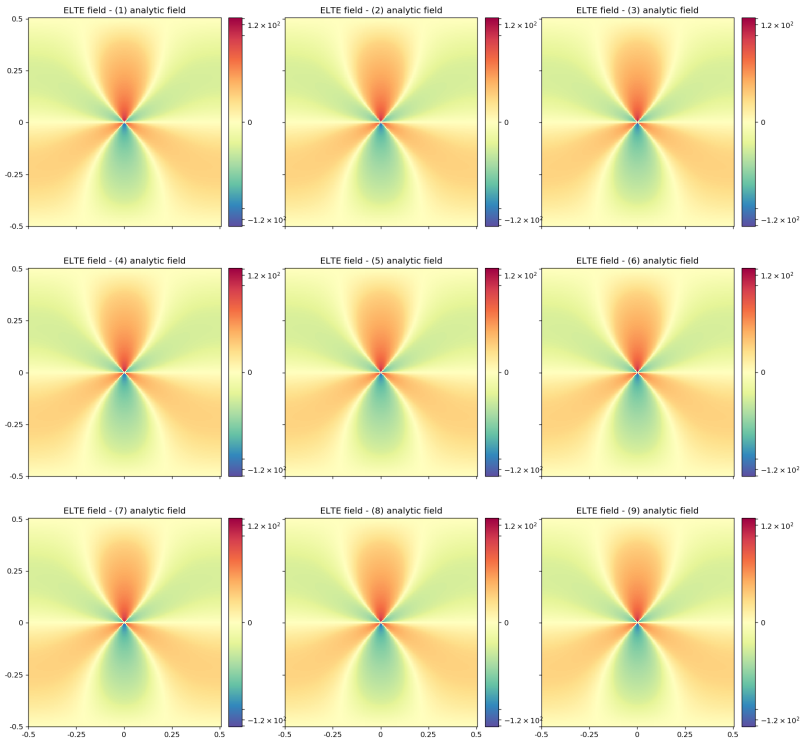


The difference doesn't really show on the images but getting the consecutive differences of images and displaying that one can achive much better visualization of the fields:



Where row - column ordering is created. It can be seen that the very last plot, that shows the difference between the 3rd and 4th analytic fields, where N=4 or N=3. It can be clearly seen that disregarding some points the analytic fields become equal from N=3 and therefore the difference is almost everywhere zero.

Having plotted the difference of analytic fields I moved on with showing the differences of analytic and ELTE code-named stress fields.



From this plot it can be derived that they are equal almost everywhere but in the middle where the differences are significant.