Re: Kohler illumination question...

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- *From*: "justbeats" <steve_beats@xxxxxxxxxxx>
- *Date*: 29 Apr 2005 06:46:55 −0700

> ... I wonder what the effect is of non−uniform illumination of these filters.
> Probably not much. But maybe not....

Tried it out last night − I can confirm (for my setup) that seriously defocussing the lamp image in the Kohler setup does have a small but detectable effect on DIC images (40x/NA 0.9 multi imm. objective using water as immersion medium). The faux 3d effect is noticably "crisper" with more contrast between the light and dark features when the lamp is perfectly focussed (but still behind frosted glass). Seriously defocussing smooths the transitions from light to dark a little − yielding a much less crisp appearance. Strangely − this was less noticeable when a DeSarnemont compensator was added to the mix, but maybe that's just because my eye cannot see the differences so well in a highly coloured view that the lambda plate gives you.

Phase contrast (40/0.65 PH2 objective) didn't seem to be affected − except in terms of reducing overall light level a bit when the filament image was very much defocussed.

Uneven lighting, on the other hand, just gives you that, an unevenly illuminated specimen − whatever technique is used.

Cheers
Beats

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- ***References***:
  - ♦ ***Kohler illumination question...***
    - ◊ *From:* justbeats
  - ♦ ***Re: Kohler illumination question...***
    - ◊ *From:* Aaron
  - ♦ ***Re: Kohler illumination question...***
    - ◊ *From:* Andy Resnick

- Prev by Date: ***DSLR − background field colour cast...***

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