

Supplementary Table S5 – Generalized estimating equations, total scores

|                      | Status                |                  |                      |              | Change                 |                  |                       |                  |
|----------------------|-----------------------|------------------|----------------------|--------------|------------------------|------------------|-----------------------|------------------|
|                      | Univariate            |                  | Multivariable        |              | Univariate             |                  | Multivariable         |                  |
|                      | B (95% CI)            | p                | B (95% CI)           | p            | B (95% CI)             | p                | B (95% CI)            | p                |
| <b>HAQ</b>           |                       |                  |                      |              |                        |                  |                       |                  |
| <b>Synovitis</b>     | 0.04<br>(0.03;0.04)   | <b>&lt;0.001</b> | 0.00<br>(-0.01;0.01) | 0.82         | 0.03<br>(0.01;0.06)    | <b>0.01</b>      | -0.01<br>(-0.04;0.03) | 0.75             |
| <b>Tenosynovitis</b> | 0.03<br>(0.02;0.03)   | <b>&lt;0.001</b> | 0.00<br>(-0.01;0.01) | 0.87         | 0.05<br>(0.03;0.06)    | <b>&lt;0.001</b> | 0.05<br>(0.03;0.07)   | <b>&lt;0.001</b> |
| <b>Osteitis</b>      | 0.01<br>(0.01;0.02)   | <b>0.001</b>     | 0.00<br>(0.00;0.01)  | 0.15         | 0.02<br>(0.00;0.03)    | <b>0.01</b>      | 0.01<br>(-0.01;0.03)  | 0.48             |
| <b>Erosion</b>       | -0.04<br>(-0.12;0.04) | 0.35             |                      |              | 0.08<br>(-0.09;0.26)   | 0.35             |                       |                  |
| <b>JSN</b>           | -0.02<br>(-0.10;0.06) | 0.65             |                      |              | -0.02<br>(-0.25;0.21)  | 0.84             |                       |                  |
| <b>Inflammation</b>  | 0.01<br>(0.01;0.02)   | <b>&lt;0.001</b> | 0.0<br>(0.00;0.01)   | 0.25         | 0.02<br>(0.01;0.03)    | <b>&lt;0.001</b> | 0.02<br>(0.01;0.03)   | <b>&lt;0.001</b> |
| <b>Damage</b>        | 0.01<br>(-0.09;0.10)  | 0.88             |                      |              | 0.07<br>(-0.11;0.24)   | 0.44             |                       |                  |
| <b>VAS-PtGlobal*</b> |                       |                  |                      |              |                        |                  |                       |                  |
| <b>Synovitis</b>     | 0.06<br>(0.04;0.07)   | <b>&lt;0.001</b> | 0.02<br>(0.01;0.04)  | <b>0.01</b>  | 2.10<br>(1.10;3.09)    | <b>&lt;0.001</b> | 1.23<br>(0.02;2.44)   | <b>0.05</b>      |
| <b>Tenosynovitis</b> | 0.03<br>(0.02;0.04)   | <b>&lt;0.001</b> | 0.00<br>(-0.01;0.01) | 0.69         | 1.67<br>(0.92;2.41)    | <b>&lt;0.001</b> | 1.12<br>(0.31;1.93)   | <b>0.01</b>      |
| <b>Osteitis</b>      | 0.01<br>(0.00;0.02)   | 0.15             |                      |              | 0.82<br>(-0.08;1.56)   | <b>0.03</b>      | -0.04<br>(-1.00;0.91) | 0.93             |
| <b>Erosion</b>       | 0.02<br>(-0.10;0.13)  | 0.79             |                      |              | 3.10<br>(-4.70;10.90)  | 0.44             |                       |                  |
| <b>JSN</b>           | 0.07<br>(-0.06;0.21)  | 0.28             |                      |              | -3.33<br>(-12.06;5.41) | 0.46             |                       |                  |
| <b>Inflammation</b>  | 0.02<br>(0.00;0.02)   | <b>&lt;0.001</b> | 0.00<br>(0.00;0.01)  | 0.15         | 0.78<br>(0.34;1.22)    | <b>&lt;0.001</b> | 0.71<br>(0.26;1.17)   | <b>0.002</b>     |
| <b>Damage</b>        | -0.02<br>(-0.15;0.11) | 0.76             |                      |              | 1.62<br>(-5.92;9.16)   | 0.67             |                       |                  |
| <b>VAS-pain*</b>     |                       |                  |                      |              |                        |                  |                       |                  |
| <b>Synovitis</b>     | 0.06<br>(0.05;0.08)   | <b>&lt;0.001</b> | 0.03<br>(0.01;0.05)  | <b>0.001</b> | 2.31<br>(1.34;3.27)    | <b>&lt;0.001</b> | 1.16<br>(-0.06;2.38)  | 0.06             |
| <b>Tenosynovitis</b> | 0.03<br>(0.02;0.04)   | <b>&lt;0.001</b> | 0.00<br>(-0.01;0.01) | 0.87         | 1.73<br>(1.04;2.42)    | <b>&lt;0.001</b> | 1.21<br>(0.43;1.98)   | <b>0.002</b>     |
| <b>Osteitis</b>      | 0.01<br>(0.00;0.02)   | 0.27             |                      |              | 0.84<br>(0.11;1.58)    | <b>0.03</b>      | -0.08<br>(-0.97;0.81) | 0.86             |
| <b>Erosion</b>       | 0.01<br>(-0.10;0.13)  | 0.81             |                      |              | 0.13<br>(-6.85;7.10)   | 0.97             |                       |                  |
| <b>JSN</b>           | 0.03<br>(-0.08;0.14)  | 0.60             |                      |              | -1.45<br>(-10.32;7.42) | 0.75             |                       |                  |
| <b>Inflammation</b>  | 0.02<br>(0.01;0.02)   | <b>&lt;0.001</b> | 0.01<br>(0.00;0.01)  | 0.07         | 0.81<br>(0.38;1.23)    | <b>&lt;0.001</b> | 0.72<br>(0.29;1.15)   | <b>0.001</b>     |
| <b>Damage</b>        | -0.01<br>(-0.12;0.11) | 0.91             |                      |              | -0.46<br>(-7.26;6.34)  | 0.90             |                       |                  |

All GEE analyses were adjusted for age and sex. Due to statistical skewness, the damage parameters were dichotomized as follows: JSN: score >0, Erosion: Score >1, Damage: Score >2. MRI parameters with a univariate p-value < 0.10 were included in multivariable GEE analysis where CRP and SJC were incorporated. \*Log-transformed for status scores. Abbreviations: HAQ: Health assessment questionnaire, JSN: Joint space narrowing, PtGlobal: Patient global, VAS: Visual analogue scale.