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### **1** Supplementary material



2

#### 3 Figure S1

4 IQGAP1 expression in total cell extracts

5 A. Western blot analysis of IQGAP1 and  $\beta$ -actin expression on total cell extracts (n=8) at

6 different times of exposure to PAN.

7 B. IQGAP1 expression determined by densitometry at each condition. No difference was

- 8 detected (Repeated measures ANOVA).
- 9 IQGAP1 mRNA expression in PAN treated podocytes.

10 C. IQGAP1 mRNA expression was evaluated by quantitative polymerase chain reaction,

11 using as housekeeper gene  $\beta$ -actin. The IQGAP1 values for each condition: control, PAN 60

- 12 and PAN 90 were plotted to  $\beta$ -actin values. No difference of IQGAP1 mRNA expression was
- 13 observed (n=4, Friedman test).
- 14 D. Quantification of the expression of podocyte proteins on total cell extracts was quantified
- 15 with the Biorad<sup>®</sup> software. No difference was detected (n=5, Wilcoxon's test).

|                      |      | Contr | Condition   |           |          |        |
|----------------------|------|-------|-------------|-----------|----------|--------|
|                      | -    |       |             |           | Ctl      | PAN 90 |
| Chromatin            | -    | +     | +           | +         | +        | +      |
| Rabbit IgG           | 1.51 |       | +           | -         |          | 1.7    |
| Histone H3 Ab        | 12   | 12    | 2           | +         | 2        | 121    |
| IQGAP1 Ab            | -    |       |             | -         | +        | +      |
| PCR/Primers template | +/-  | +/+   | +/+         | +/+       | +/+      | +/+    |
|                      |      |       |             |           |          |        |
|                      |      |       |             |           | DI 20 mi | -      |
|                      |      |       | RI          | ſ-PCR : R | PL30 pri | mers   |
| В                    |      |       | RI          | ſ-PCR : R | PL30 pri | imers  |
| в                    |      | MW    | R1<br>Input | ſ-PCR : R | PL30 pri | imers  |
| B                    | lgG  | MW    | R1<br>Input | T-PCR : R | PL30 pri | imers  |



### 17 Figure S2

### 18 Additional Western blots

| A                    | Control |                        |      |              |     | Condition |  |
|----------------------|---------|------------------------|------|--------------|-----|-----------|--|
|                      |         |                        |      |              | Ctl | PAN 90    |  |
| Chromatin            | -       | +                      | +    | +            | +   | +         |  |
| Rabbit IgG           |         | 10                     | +    | 20           | -   | -         |  |
| Histone H3 Ab        | 12      | 1                      | 12   | +            | 2   | -         |  |
| IQGAP1 Ab            |         |                        | -    | -            | +   | +         |  |
| PCR/Primers template | +/-     | +/+                    | +/+  | +/+          | +/+ | +/+       |  |
|                      | No.     | RT-PCR : RPL30 primers |      |              |     |           |  |
|                      |         |                        | R    | PL30 primers |     |           |  |
|                      |         |                        |      |              |     |           |  |
| В                    |         |                        |      |              |     |           |  |
| _                    |         | MW                     | Inpu | t            |     |           |  |
| IP                   | lgG     |                        |      | H3           |     |           |  |
|                      |         | E                      |      | -            | WB: | IQGAP1    |  |

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### 20 Figure S3

- 21 Interaction of ERK and P-ERK with IQGAP1 on total cell extracts
- 22 IQGAP1 co-immunoprecipitations with ERK and P-ERK were performed on total extracts.
- 23 Protein A/G agarose beads (Prot A/G) were used as negative control. Control: untreated
- 24 podocytes, PAN 90: podocytes exposed 90 min to PAN (n=5).
- 25 Interaction between IQGAP1 and nuclear P-ERK increased significantly and was confirmed
- by densitometry data (n=5,  $\pm$  p<0.05, Paired t-test).

27

## 28 Figure S4

29 Podocyte proliferation assay was performed with control cells (untransfected and

- 30 lipofectamine or Luc siRNA transfected podocytes) in comparison with siRNA IQGAP1
- transfected. Control and transfected cells were treated with PAN. Control: Control podocytes,
- 32 siRNA: siRNA IQGAP1 transfected podocytes (n=5).