

Sperm Associated Antigen 6 (SPAG6) Regulates Fibroblast Cell Growth, Morphology, Migration and Ciliogenesis

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Running title: SPAG6, Acetylated Tubulin and Cell Function

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1 **Supplemental information.**

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3 **Supplemental Figure 1. Analyses of cell morphology by scan EM and Crystal blue**
4 **staining.**

5 Morphology of the wild-type and *Spag6*-deficient MEFs was analyzed by SEM (left
6 panel) and crystal blue staining (right panel). Notice that *Spag6*-deficient MEFs have
7 larger cell surface.

8

9 **Supplemental Figure 2. Examination of SPAG6 protein expression by Western blot**
10 **analysis using the COS-1 and CHO cells infected with adenovirus.**

11 The COS-1 and CHO cells were infected with control adenovirus virus or the adenovirus
12 expressing SPAG6. GFP is expressed in the cells infected with either control virus or
13 SPAG6-expressing virus. SPAG6 is only expressed when the SPAG6-expressing
14 adenovirus was used.

15

16 **Supplemental Figure 3. Exogenous expression of SPAG6 does not increase Glu-**
17 **tubulin expression in MEFs and CHO cells.**

18 Wild-type MEFs (a) and CHO cells (b) were transfected with SPAG6/pTarget. Two days
19 after transfection, the cells were double stained with an anti-SPAG6 polyclonal antibody
20 and an anti-Glu-tubulin antibody. Notice that there was no increased Glu-tubulin (in
21 green) expression in the cells expressing SPAG6 (in red).

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23

24 **Supplemental movie 1.**

25 Representative movie of wound-healing assay for wild-type MEFs. Notice that the cells
26 migrated very fast, and the wound area was occupied in about six hours after scratch.

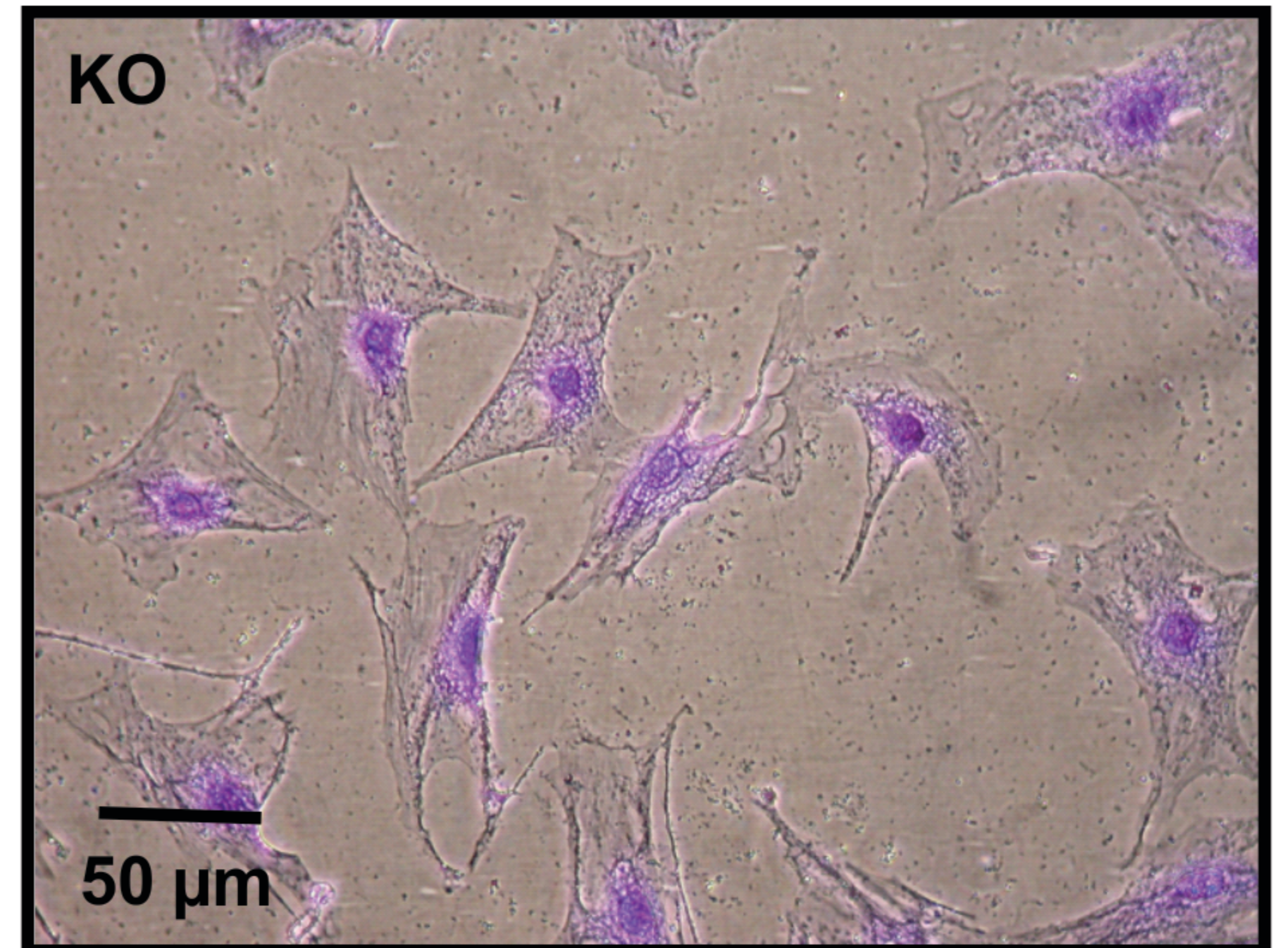
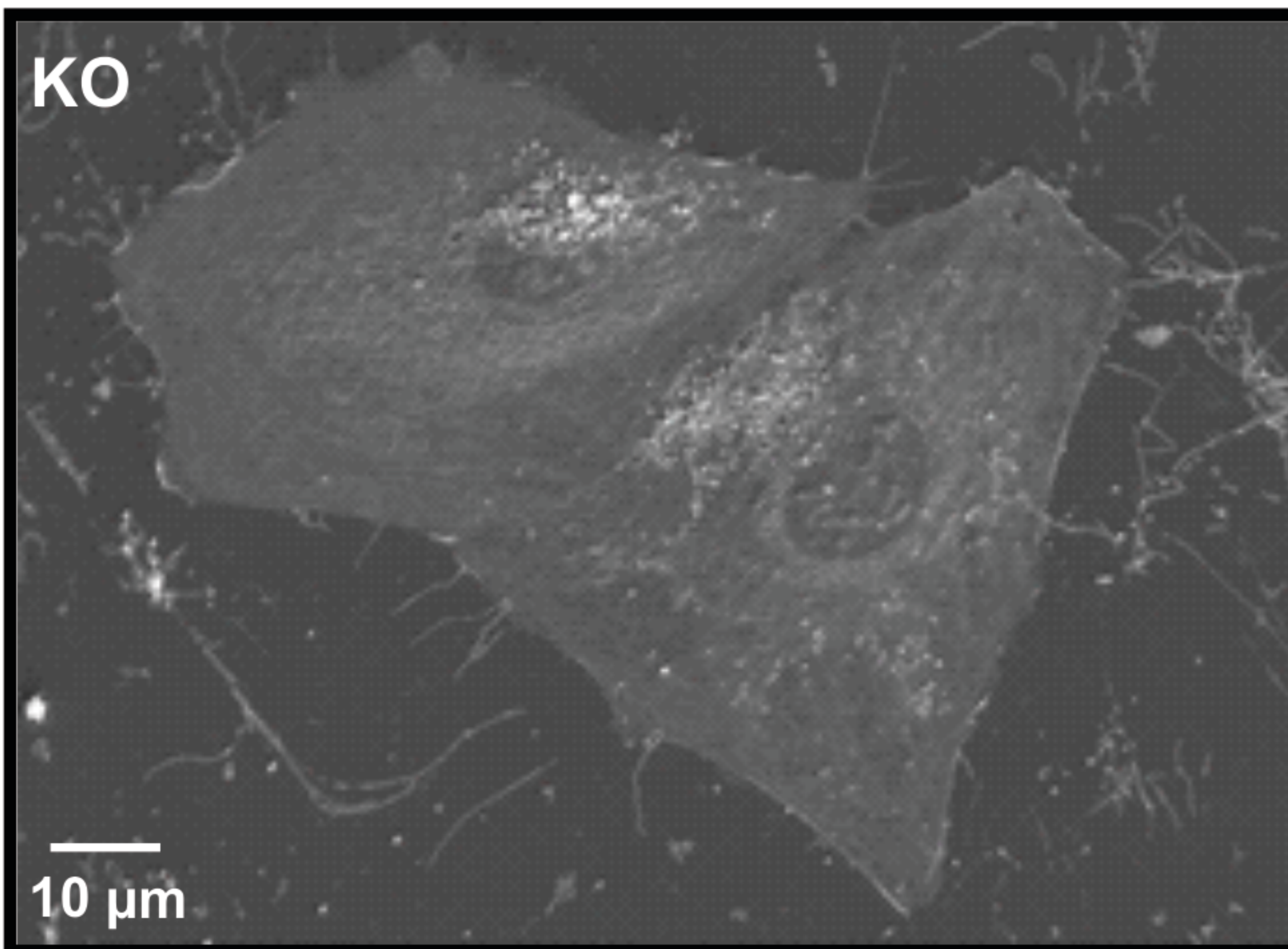
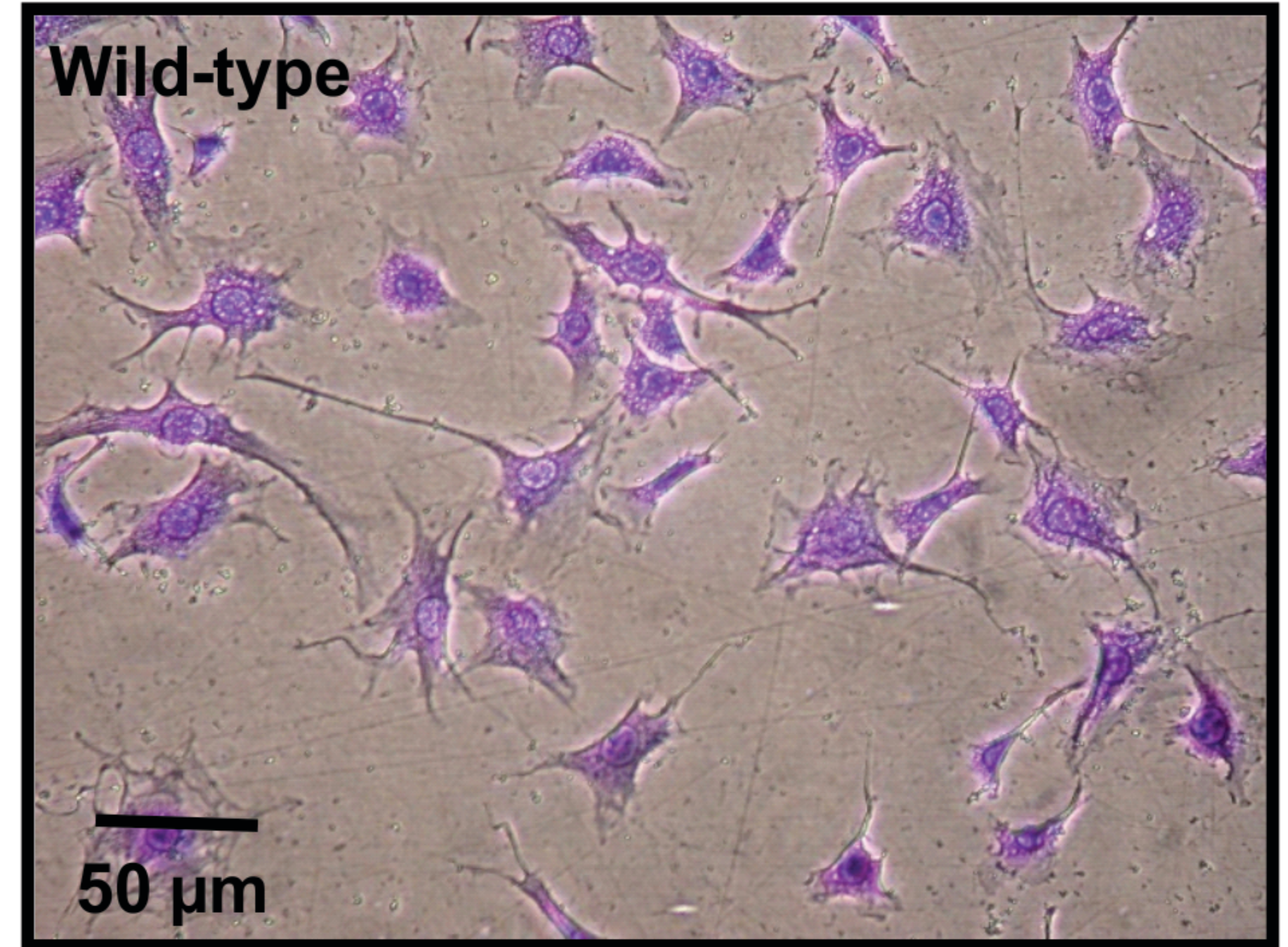
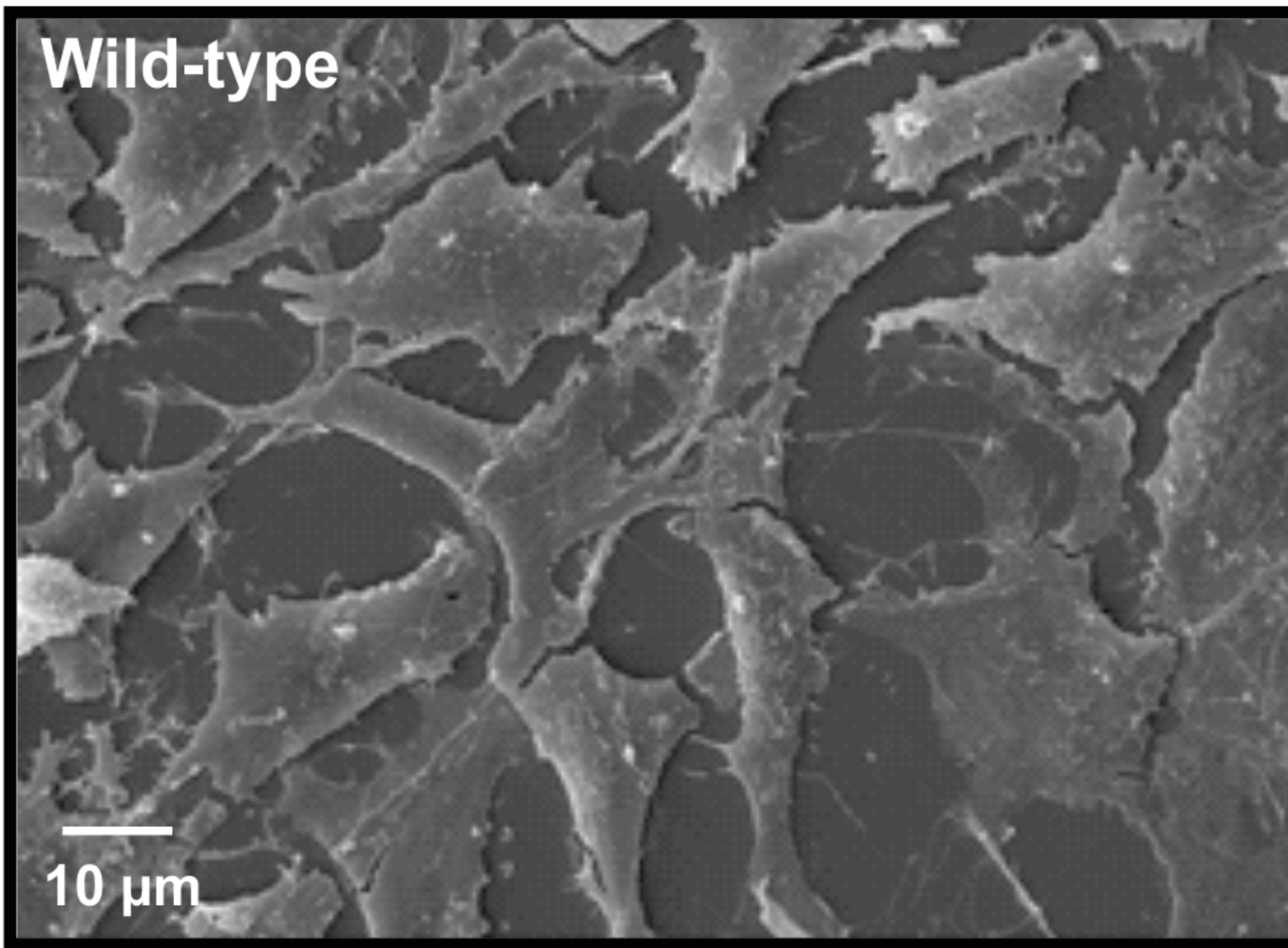
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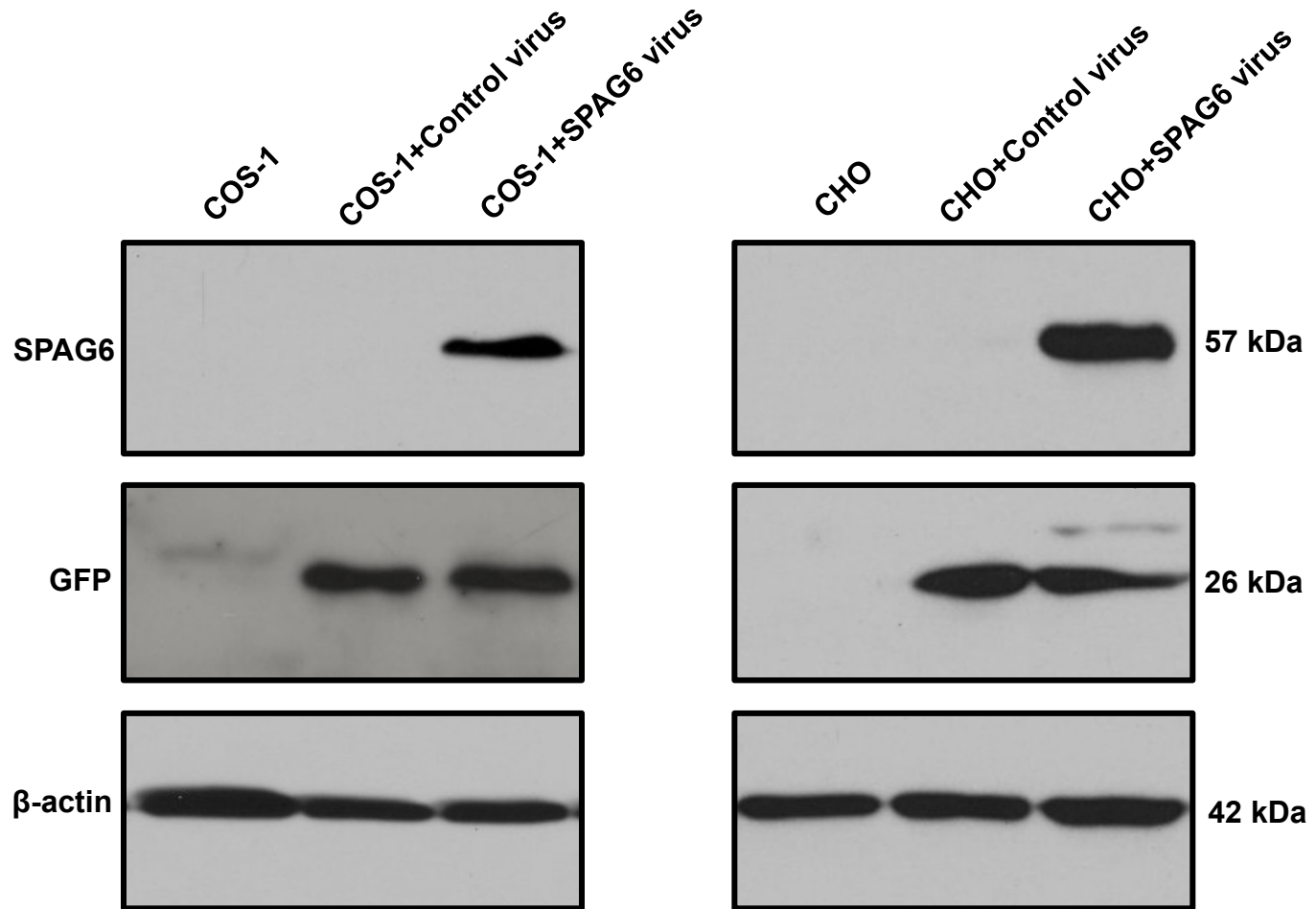
28 **Supplemental movie 2.**

29 Representative movie of wound-healing assay for *Spag6*-deficient MEFs. Notice that the
30 cells migrated slowly, and the wound area was still open even six hours after scratch.

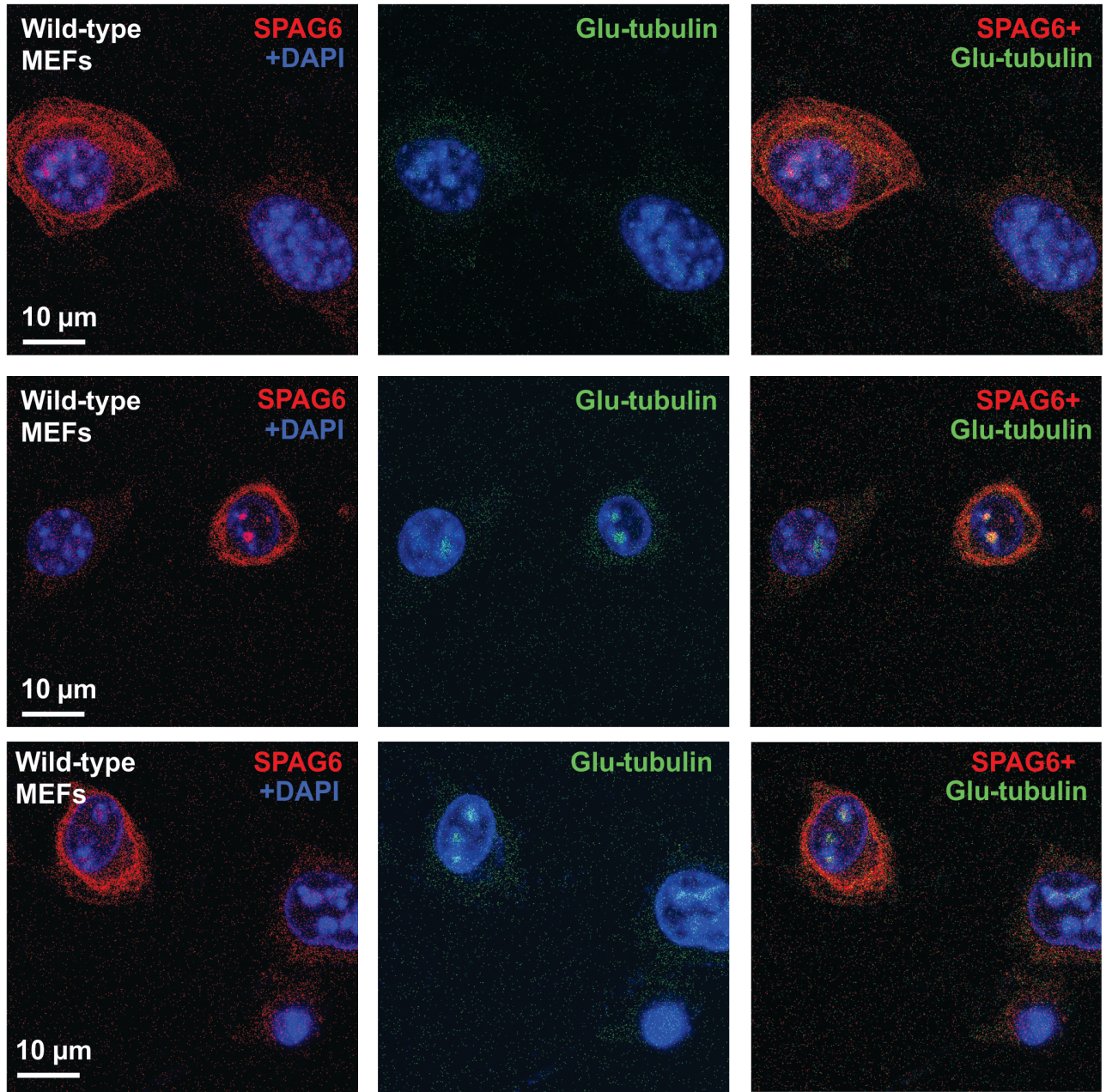
SEM

Crystal blue





a



b

