Supporting Information

A noncanonical endocytic pathway is involved in the internalization of 3 μ m polystyrene beads into HeLa cells

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Fig. S1. Cellular uptake of pHrodo-beads (3 μm) into (A) U2OS cells and (B) RPE1 cells. Scale bar, 50 μm.

Α	CD147	CD71	merge	DIC
10 min				
16 min				
28 min		*		
50 min	Joseph L			
В	CD147	CD71	merge	DIC
B 10 min	CD147	CD71	merge	DIC
B 10 min 12 min		CD71	merge	DIC
B 10 min 12 min 30 min		CD71	merge	DIC

56 min

Fig. S2. Cellular uptake of (A) amino beads (3 μ m) and (B) carboxyl beads (3 μ m) into HeLa cells without labeling pHrodo. The cells were stained with Alexa488- and Alexa647-labeled antibodies against CD147 and CD71, respectively. Scale bar, (A) 20 μ m, (B) 20 μ m. Green color represents CD147 signal (Alexa488); Magenta color represents CD71 signal (Alexa647). Arrowheads indicate the early stage of internalization of the beads; arrows indicate maturation or acidification of endosomes containing the beads. The time point zero represents the start of the incubation of pHrodobeads with cells. DIC, differential interference contrast.

Supplementary Video

Video S1. Time-lapse video of HeLa cells incubated with pHrodo-beads using scanning ion conductance microscopy (The movie of Fig. 6B). The images were captured every approximately 2 min.