

Supplementary materials

Table S1: The sequence of shRNA.

<i>Target</i>	<i>shRNA sequence</i>	<i>Region</i>	<i>Ref Seq</i>
<i>CCR1</i> ^{#1}	<i>CCCTACAATTTGACTATACTT</i>	<i>CDS</i>	<i>NM_001295</i>
<i>CCR1</i> ^{#2}	<i>GCTCTGAACTGAACCTCTTT</i>	<i>CDS</i>	<i>NM_001295</i>
<i>CCR1</i> ^{#3}	<i>CCTCTGTACTCCTTGGTATTT</i>	<i>CDS</i>	<i>NM_001295</i>
<i>CCL15</i> ^{#1}	<i>CCAGTAGTTCTGAACAGCTTT</i>	<i>CDS</i>	<i>NM_004167</i>
<i>CCL15</i> ^{#2}	<i>GCACCTCCTACATCTCACAAA</i>	<i>CDS</i>	<i>NM_004167</i>
<i>CCL15</i> ^{#3}	<i>GCCCAGTTCATAAATGATGCA</i>	<i>CDS</i>	<i>NM_004167</i>

Table S2: The sequence of primer for RT-qPCR.

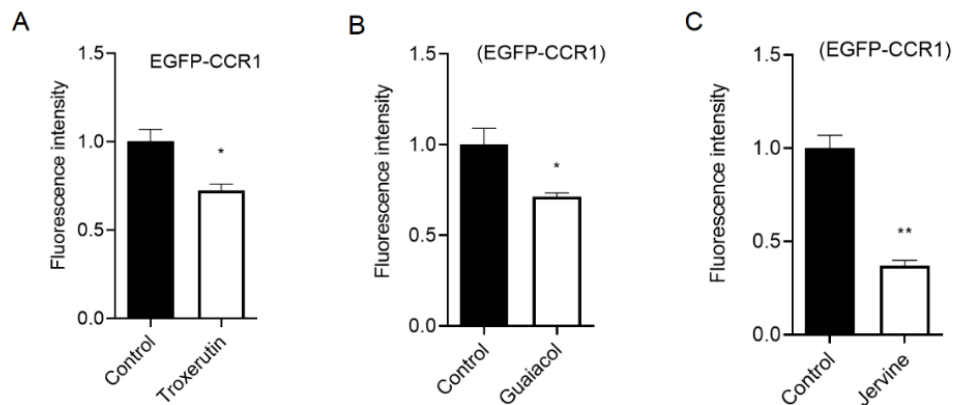
<i>Target</i>	<i>Forward Primer (5'–3')</i>	<i>Reverse Primer (5'–3')</i>
<i>CCR1</i>	<i>GACTATGACACGACCACAGAGT</i>	<i>CCAACCAGGCCAATGACAAATA</i>
<i>CCL15</i>	<i>TCCCAGGCCCAGTTCATAAAT</i>	<i>TGCTTTGTGAGATGTAGGAGGT</i>

Table S3: The list of antibodies for Western blotting and Immunofluorescence.

<i>Antibody</i>	<i>Manufacturer</i>	<i>Product code</i>
<i>CCR1</i>	<i>Abclone</i>	<i>A18341</i>
<i>CCL15</i>	<i>Abcam</i>	<i>Ab197016</i>
<i>Ki67</i>	<i>CST</i>	<i>#9449</i>
<i>PCNA</i>	<i>CST</i>	<i>#2586</i>
<i>E-CAD</i>	<i>CST</i>	<i>#14472</i>
<i>N-CAD</i>	<i>CST</i>	<i>#1516</i>
<i>CDK2</i>	<i>Santa Cruz</i>	<i>Sc-6248</i>
<i>AKT</i>	<i>Proteintech</i>	<i>60203-2-Ig</i>
<i>p-AKT</i>	<i>CST</i>	<i>#9271</i>
<i>ERK1/2</i>	<i>Proteintech</i>	<i>11257-1-AP</i>
<i>p-ERK1/2</i>	<i>CST</i>	<i>#4695</i>
<i>c-Jun</i>	<i>CST</i>	<i>#9165</i>

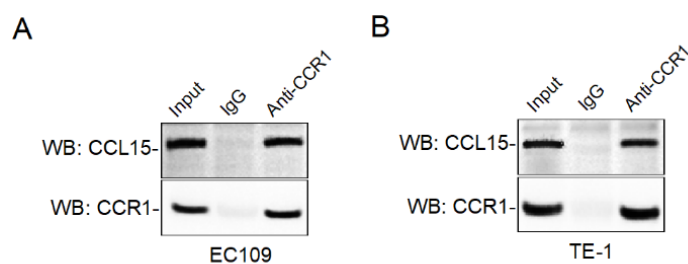
<i>p-c-Jun</i>	<i>CST</i>	#91952
<i>GAPDH</i>	<i>Abclone</i>	AC001

Supplementary Figure 1



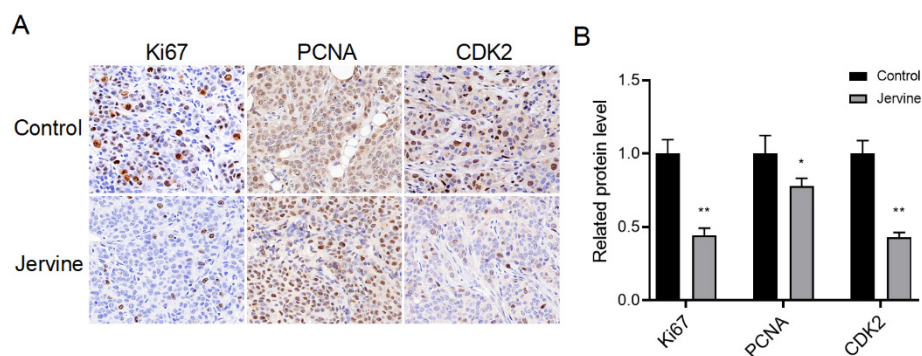
Supplementary figure 1. The degradative effects of Troxerutin, Guaiacol, and Jervine on CCR1. (A-C) The fluorescence intensity of CCR1-EGFP was measured using the fluorescence microplate reader. * vs. Control, * $p < 0.05$, ** $p < 0.01$.

Supplementary Figure 2



Supplementary figure 2. Interaction analysis between CCR1 and CCL15. (A-B) Interaction between CCR1 and CCL15 in EC109 and TE-1 cells was analyzed by Co-IP.

Supplementary Figure 3



Supplementary figure 3. Effect of Jervine on the expression of Ki67, PCNA and CDK2. (A-B)

Immunohistochemistry was used to analyze Ki67, PCNA and CDK2 expressions. * vs. Control, * p <0.05, ** p <0.01.