Table A: Test accuracy (%) on four generic long-tailed image recognition datasets.

Methods	CIFAR-10-LT			CIFAR-100-LT			ImageNet-100-LT			Places-LT		
	Old	New	All	Old	New	All	Old	New	All	Old	New	All
ABC†	77.7	20.2	48.9	48.5	20.8	43.0	-	-	-	-	-	-
DARP†	77.6	35.2	56.4	54.5	24.0	48.4	-	-	-	-	-	-
OpenLDN†	74.8	49.0	61.9	50.4	32.9	46.9	-	-	-	-	-	-
TRSSL†	78.4	66.8	72.6	58.7	35.8	54.1	-	-	-	-	-	-
ORCA†	77.5	55.6	66.6	55.0	30.8	50.1	69.3	29.0	49.2	21.5	6.9	14.2
SimGCD	75.1	41.5	58.3	59.8	24.6	52.8	81.1	33.4	57.8	**31.4**	18.2	24.8
GCD	78.5	71.7	75.1	65.5	49.0	62.2	81.0	76.8	78.9	29.8	22.7	26.2
OpenCon†	**87.2**	47.2	67.2	64.2	40.9	59.6	83.3	42.8	63.0	30.6	12.4	21.6
BaCon-O	83.3	78.0	80.7	66.5	69.6	67.1	**84.2**	80.0	82.1	30.7	25.6	28.1
BaCon-S	85.6	**78.7**	**82.2**	**66.8**	**71.0**	**67.6**	83.9	**80.6**	**82.3**	31.1	**28.4**	**29.9**

Table B: Test accuracy (%) and balancedness (Std↓) on CIFAR-100-LT.

Methods	Known					Novel					Overall
	Many↑	Med↑	Few↑	Std↓	All↑	Many↑	Med↑	Few↑	Std↓	All↑	
ABC†	77.4	51.6	16.3	25.0	48.5	20.8	32.0	5.9	10.7	20.8	43.0
DARP†	74.8	55.2	33.4	16.9	54.5	29.9	30.1	10.0	9.4	24.0	48.4
OpenLDN†	77.4	49.1	24.8	21.5	50.4	57.3	24.8	14.4	17.9	32.9	46.9
TRSSL†	78.8	**73.0**	24.1	24.3	58.7	32.7	50.9	18.8	13.1	35.8	54.1
ORCA†	73.6	60.0	31.0	17.8	55.0	47.5	28.4	17.2	12.5	30.8	50.1
SimGCD	71.1	72.8	34.6	17.6	59.8	32.9	25.8	15.5	7.1	24.6	52.8
GCD	75.9	69.4	52.9	9.7	65.5	41.9	54.2	49.8	5.1	49.0	62.2
OpenCon†	**86.8**	69.7	35.8	21.2	64.2	55.8	48.9	15.3	17.7	40.9	59.6
BaCon-O	72.9	64.7	**62.0**	**4.6**	66.5	72.6	70.6	**65.3**	**3.1**	69.6	67.1
BaCon-S	73.5	65.6	61.2	5.1	**66.8**	**74.7**	**73.1**	64.5	4.5	**71.0**	**67.6**

Table C: Test accuracy (%) and balancedness (Std↓) on CIFAR-100-LT.

Methods	Known					Novel					Overall
	Many↑	Med↑	Few↑	Std↓	All↑	Many↑	Med↑	Few↑	Std↓	All↑	
SimGCD	71.1	**72.8**	34.6	17.6	59.8	32.9	25.8	15.5	7.1	24.6	52.8
+BCL	73.3	68.5	41.9	13.8	61.4	34.9	28.2	19.1	6.5	27.5	54.6
GCD	75.9	69.4	52.9	9.7	65.5	41.9	54.2	49.8	5.1	49.0	62.2
+BCL	**76.6**	67.4	55.7	8.5	66.6	39.2	55.1	49.8	6.6	48.7	63.3
BaCon-O	72.9	64.7	**62.0**	**4.6**	66.5	72.6	70.6	**65.3**	**3.1**	69.6	67.1
BaCon-S	73.5	65.6	61.2	5.1	**66.8**	**74.7**	**73.1**	64.5	4.5	**71.0**	**67.6**

Table D: Accuracy (%) and balancedness (Std↓) of the pseudo-labeling branch on CIFAR-10.

Epoch	Branch	Known					Novel					Overall
		Many↑	Med↑	Few↑	Std↓	All↑	Many↑	Med↑	Few↑	Std↓	All↑	
50	Pseudo-labeling	85.3	93.1	85.1	3.7	88.3	65.0	69.6	51.1	7.8	61.3	74.8
	Contrastive-learning	96.0	84.3	73.2	9.3	82.2	69.7	73.6	66.3	2.9	69.9	76.0
100	Pseudo-labeling	86.9	92.2	88.1	2.2	89.5	61.5	68.9	53.4	6.4	61.2	75.3
	Contrastive-learning	89.3	92.2	83.7	3.6	88.2	60.4	64.9	59.9	2.2	62.0	75.1

Table E: Accuracy of SSL methods with contrastive learning.

Methods	CIFAR-10-LT			CIFAR-100-LT		
	Old	New	All	Old	New	All
Opencos†	71.3	14.2	42.8	57.1	19.7	49.6
Simmatch†	78.6	16.7	47.7	61.7	10.4	51.5
BaCon-S	**85.6**	**78.7**	**82.2**	**66.8**	**71.0**	**67.6**

Table F: Accuracy on Herbarium.

Methods	Old	New	All
ORCA	14.7	4.9	9.8
GCD	41.4	24.2	32.8
SimGCD	**51.4**	27.3	39.4
BaCon-S	47.0	**38.6**	**42.8**

Table G: Test accuracy (%) on different novel classes.

Dataset	Old	New	All
Known+Novel_val	83.9	80.6	82.3
Known+Novel_test_A	80.4	85.8	83.1
Known+Novel_test_B	83.3	80.2	81.8
Known+Novel_test_C	82.1	81.2	81.7
Known+Novel_test_D	84.6	79.5	82.0
Known+Novel_test_E	82.2	82.7	82.4
Average (Acc/Std)	82.5 / 1.4	81.9 / 2.2	82.4 / 0.5