

Contents

1	Economic/Academic Importance of <i>Brassica rapa</i>	1
	Rifei Sun	
2	Background History of the National and International <i>Brassica rapa</i> Genome Sequencing Initiatives	17
	Ian Bancroft and Xiaowu Wang	
3	Genomic Resources and Physical Mapping of the <i>B. rapa</i> Genome	25
	Jeong-Hwan Mun, Hee-Ju Yu and Beom-Seok Park	
4	De Novo Genome Assembly of Next-Generation Sequencing Data	41
	Min Liu, Dongyuan Liu and Hongkun Zheng	
5	Crop Genome Annotation: A Case Study for the <i>Brassica rapa</i> Genome	53
	Erli Pang, Huifeng Cao, Bowen Zhang and Kui Lin	
6	Miniature Transposable Elements (mTEs): Impacts and Uses in the <i>Brassica</i> Genome	65
	Perumal Sampath, Jonghoon Lee, Feng Cheng, Xiaowu Wang and Tae-Jin Yang	
7	Genomic Survey of the Hidden Components of the <i>B. rapa</i> Genome	83
	Nomar Espinosa Waminal, Sampath Perumal, Ki-Byung Lim, Beom-Seok Park, Hyun Hee Kim and Tae-Jin Yang	
8	The Common Ancestral Genome of the <i>Brassica</i> Species . . .	97
	Feng Cheng, Martin A. Lysak, Terezie Mandáková and Xiaowu Wang	
9	Genome Evolution after Whole Genome Triplication: the Subgenome Dominance in <i>Brassica rapa</i>	107
	Feng Cheng, Jian Wu, Bo Liu and Xiaowu Wang	

10	Genome Triplication Drove the Diversification of <i>Brassica</i> Plants	115
	Feng Cheng, Jian Wu, Jianli Liang and Xiaowu Wang	
11	Comparative Analysis of Gene Conversion Between Duplicated Regions in <i>Brassica rapa</i> and <i>B. oleracea</i> Genomes	121
	Jinpeng Wang, Hui Guo, Dianchuan Jin, Xiyin Wang and Andrew H. Paterson	
12	Molecular Mapping and Cloning of Genes and QTLs in <i>Brassica rapa</i>	131
	Guusje Bonnema	
13	Impact Molecular Marker and Genomics-Led Technologies on <i>Brassica</i> Breeding	145
	Jianjun Zhao	
14	The Database for <i>Brassica</i> Genome Studies—BRAD.	155
	Feng Cheng, Xiaobo Wang, Jian Wu and Xiaowu Wang	
15	Future Prospects.	165
	Xiaowu Wang and Feng Cheng	