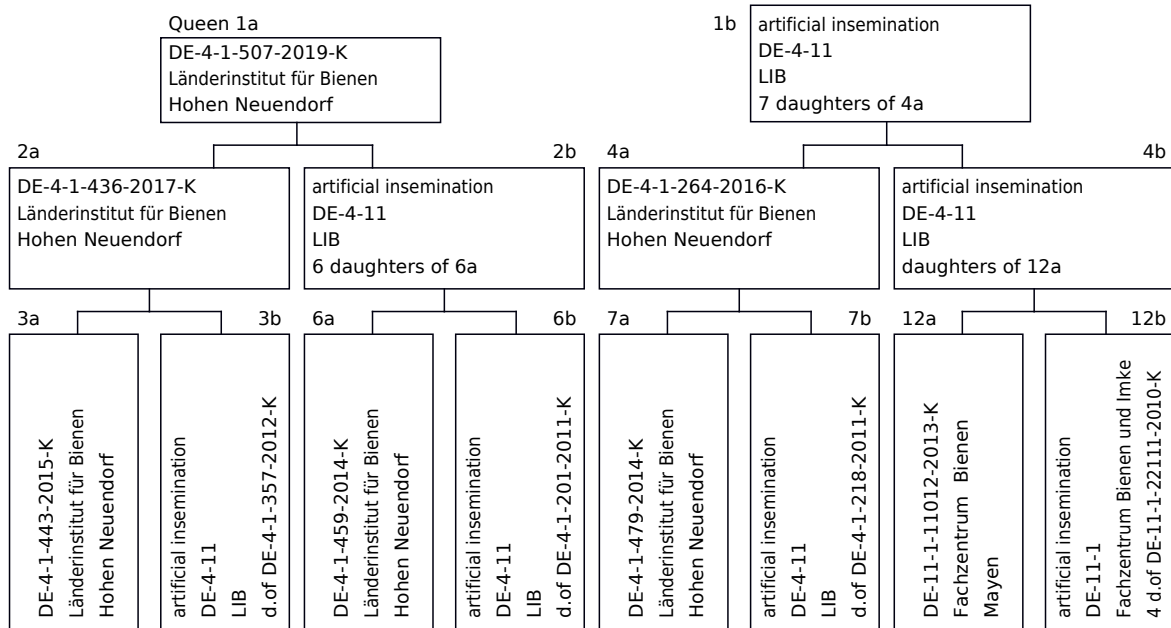


Tester of the queen: Länderinstitut für Bienenkunde, 16540 Hohen Neuendorf, DE-4-1, Apiary 2  
 Breeder of the queen: Länderinstitut für Bienenkunde, 16540 Hohen Neuendorf, DE-4-1  
**1a** Studbook number: **DE-4-1-507-2019-K**

Race line: -33 Sign: green 7 Daughters of Queen: 8.4%  
 Generation: Hatch date: 24.06.2019 Workers: 5.2%

### A. Pedigree



### B. Own performance

Performance test year	No. of the colony 225			comparable colonies at the apiary		
	kg	%	Ranking	number	Yield average kg	
	11.1	46.5	24	27	23.9	
	Assessment*	Breeding values			Reliability	
<b>Total breeding value<sup>1</sup></b>	-	106	■			
Honey yield	-	102	■			0.48
Defensive behavior	3.40	101	■			0.57
Steadiness on comb	3.30	100	■			0.57
Swarming drive	4	107	■			0.47
Varroa	-	107	■			0.5
Performance index	-	103	■			0.47
Robustness in winter	2.70	70% 100% 170%				
Development in Spring	2.80					
Colony strength	3					

<sup>1</sup>In accordance with the resolution of the breeder convention of 9th April 2011, for the total breeding value, Varroa tolerance is weighted by 40% and honey yield, gentleness, calmness during inspection, and swarming tendency are each weighted by 15%.

### C. Performance of the sisters

See page 2

### D. Body features, see appendix

See attached characteristic documents:

### E. Results

#### Class Av

Selected for Varroa tolerance. Suitable for breeding with no restrictions; suitable for use as a 4a colony at frequently visited mating stations.

# Breeding selection report DE-4-1-507-2019-K

## Page 2

### Performance of the sisters

Amount of checked sisters: 13

Studbook number	Tester of the queen	Apiary	Total breeding value	Yield kg	Breeding Value Honey	Defensive behavior	Breeding Value Defensive	Calmness during inspection	Breeding Value Calmness	Swarming drive	Breeding Value Swarming	Varroa-index	Performance index
DE-4-1-497-2019	DE-4-1	1	104	0.5	97	3	Behavior	3	100	4	106	107	100
DE-4-1-501-2019	DE-4-1	1	102	18.1	103	3	97	2.8	96	3.9	106	101	100
DE-4-1-502-2019	DE-4-1	1	108	31	108	3.5	104	3.3	102	4	107	106	106
DE-4-1-504-2019-K	DE-4-1	1	102	23	105	3.3	102	3.2	101	4	107	96	104
DE-4-1-506-2019	DE-4-1	1	106	31.3	108	3	98	3	97	4	106	106	103
DE-4-1-515-2019	DE-4-1	1	104	0	97	3	99	3	98	4	106	107	100
DE-4-1-569-2019	DE-4-1	1	106	16.8	103	3.1	100	3.1	99	4	107	107	102
DE-4-1-507-2019-K	DE-4-1	2	106	11.1	102	3.4	101	3.3	100	4	107	107	103
DE-4-1-508-2019	DE-4-1	2	105	16	103	3.3	99	3.1	98	4	107	106	102
DE-4-1-514-2019	DE-4-1	2	106	29.2	106	3.4	99	2.9	96	4	106	107	102
DE-4-1-561-2019	DE-4-1	2	105	19.6	103	3.2	98	3	96	4	106	106	101
DE-4-1-567-2019	DE-4-1	2	104	29.6	107	3.4	100	3.2	99	4	107	101	104
DE-4-1-568-2019	DE-4-1	2	108	43.8	112	3.5	102	3.4	101	3.7	105	108	106