

Support information

Table S1. Primers of ARGs used in this study.

ARGs	Sequence (5-3')	Annealing temperature (°C)	Reference
<i>tetA</i>	FW GCTACATCCTGCTTGCCTTC	60	Ng et al., 2001
	RV CATAGATCGCCGTGAAGAGG		
<i>tetB</i>	FW TTGGTTAGGGGCAAGTTTTG	58	Ng et al., 2001
	RV GTAATGGGCCAATAACACCG		
<i>tetE</i>	FW AAACCACATCCTCCATACGC	60	Ng et al., 2001
	RV AAATAGGCCACAACCGTCAG		
<i>tetO</i>	FW AACTTAGGCATTCTGGCTCAC	45	Ng et al., 2001
	RV TCCCACTGTTCCATATCGTCA		
<i>suII</i>	FW CGCACCGGAAACATCGCTGCAC	45	Pei et al., 2006
	RV TGAAGTTCGCGCAAGGCTCG		
<i>suIII</i>	FW TCCGGTGGAGGCCGGTATCTGG	45	Pei et al., 2006
	RV CGGGAATGCCATCTGCCTTGAG		
<i>suIII</i>	FW TCCGTTTACGCGAATTGGTGCAG	45	Pei et al., 2006
	RV TTCGTTTACGCCTTACACCAGC		
<i>sulA</i>	FW TCTTGAGCAAGCACTCCAGCAG	45	Pei et al., 2006
	RV TCCAGCCTTAGCAACCACATGG		
<i>qnrA</i>	FW ATTTCTCACGCCAGGATTTG	54	Robicsek et al., 2006
	RV GATCGGCAAAGGTTAGGTCA		
<i>qnrS</i>	FW ACGACATTCGTCAACTGCAA	54	Robicsek et al., 2006
	RV TAAATTGGCACCCCTGTAGGC		

Table S2. ANOVA analyzing for antibiotics

		Sun of Squares	df	Mean Square	F	Sig
SMX	Between-group	0.401	3	0.134	12.100	0.002
	Within-group	0.088	8	0.011		
	Total	0.490	11			
SMT	Between-group	0.358	3	0.119	16.399	0.001
	Within-group	0.058	8	0.007		
	Total	0.416	11			
NFC	Between-group	0.624	3	0.208	20.182	0.000
	Within-group	0.082	8	0.010		
	Total	0.706	11			
OFC	Between-group	1.050	3	0.350	30.303	0.000
	Within-group	0.092	8	0.012		
	Total	1.142	11			
TC	Between-group	306.311	3	102.104	487.253	0.000
	Within-group	1.676	8	0.210		
	Total	307.988	11			
OTC	Between-group	34.444	3	11.481	195.011	0.000
	Within-group	0.471	8	0.059		
	Total	34.915	11			
CTC	Between-group	329646.891	3	109882.297	4556.043	0.000
	Within-group	192.943	8	24.118		
	Total	329839.835	11			

Table S3. PECs of antibiotics in surface soil ($\mu\text{g g}^{-1}$ fresh weight) after amended with fresh-feces, dried-feces, or aqueous phase or solid phase of biogas-slurry.

		Fresh feces	Dried feces	Biogas-slurry	
				aqueous phase	solid phase
SAs	SMX	4.56E-4	\	1.57E-2	4.44E-5
	SMT	4.67E-4	3.79E-5	5.42E-3	7.11E-5
FQs	NFC	6.53E-4	9.48E-5	1.03E-2	4.09E-4
	OFC	8.19E-4	7.11E-5	7.79E-3	4.18E-4
	TC	7.58E-3	1.66E-3	7.53E-2	1.22E-2
TCs	OTC	9.85E-4	1.33E-4	3.87E-2	3.78E-3
	CTC	2.96E-1	2.72E-02	8.05E-1	3.62E-1

\ indicates below the detection limitation in dried feces.

Table S4. ANOVA analyzing for data of antibiotic resistance genes

		Sun of Squares	df	Mean Square	F	Sig
sulI	Between-group	3159.869	3	1053.290	5242.014	0.000
	Within-group	1.607	8	0.201		
	Total	3161.477	11			
sulII	Between-group	2232128.578	3	744042.859	68.270	0.000
	Within-group	87188.161	8	10898.520		
	Total	2319316.740	11			
sulIII	Between-group	1008610.963	3	336203.654	75.836	0.000
	Within-group	35466.234	8	4433.279		
	Total	1044077.196	11			
sulA	Between-group	6227.087	3	2075.696	32.199	0.000
	Within-group	515.723	8	64.465		
	Total	6742.810	11			
qnrA	Between-group	0.229	3	0.076	305.100	0.000
	Within-group	0.002	8	0.000		
	Total	0.231	11			
qnrS	Between-group	0.012	3	0.004	155.000	0.000
	Within-group	0.000	8	0.000		
	Total	0.012	11			
tetA	Between-group	8.264	3	2.755	318.451	0.000
	Within-group	0.069	8	0.009		
	Total	8.333	11			
tetE	Between-group	844.806	3	281.602	10.009	0.004
	Within-group	225.076	8	28.135		
	Total	1069.882	11			
tetB	Between-group	12.112	3	4.037	12.949	0.002
	Within-group	2.494	8	0.312		
	Total	14.606	11			
tetO	Between-group	87829.267	3	29276.422	16.524	0.001
	Within-group	14173.848	8	1771.731		
	Total	102003.115	11			