155 **Concentrations of digestible and metabolizable and net energy in soybean meal produced throughout the United States and fed to pigs.** K. M. Sotak*, H. H. Stein, *University of Illinois at Urbana-Champaign, Urbana.*

An experiment was conducted to measure the in vivo digestibility of energy and concentrations of DE and ME in soy-

Table 155. Concentrations of DE, ME, and NE and ATTD in corn and soybean meal (DM basis)

		SBM Zone[1]				
Item	Corn	1	2	3	4	SEM
ATTD of GE, %	86.10[b]	91.76[a]	91.63[a]	89.34[ab]	90.84[ab]	3.94
DE, kcal/kg	3834[c]	4343[a]	4319[a]	4135[b]	4248[ab]	121.01
ME, kcal/kg	3699[c]	4098[a]	4117[a]	3926[bc]	4039[ab]	135.62
NE, kcal/kg	2699[b]	2939[a]	2951[a]	2815[b]	2895[ab]	98.46

[a–d]Means within a row lacking a common superscript are different ($P < 0.05$).
[1]Zones = 1: Northern U.S.; 2: Eastern U.S.; 3. Western U.S.; 4: Illinois.

bean meal (SBM) fed to growing pigs. Twenty-three growing barrows (initial BW: 26.4 ± 1.8 kg) were allotted to a 23 × 8 Youden square design with pigs and period as the 2 blocking criteria. Twenty-two sources of SBM were procured from crushing facilities throughout the Midwest. For analysis, the crushing plant locations were separated into 4 zones: 1) Northern U.S., 2) Eastern U.S., 3) Western U.S., and 4) Illinois. The dietary treatments included a corn-based diet and 22 diets based on a mixture of corn and each source of SBM. The ATTD of GE in SBM from Zones 1 and 2 were greater *(*$P \leq 0.05$) than the ATTD of GE in corn but were not different from the ATTD of GE from Zones 3 and 4. The DE in SBM from Zones 1 and 2 were greater ($P \leq 0.05$) than the DE in corn. The DE in SBM from Zones 3 and 4 were not different from the DE in corn or SBM from Zones 1 and 2. The ME in SBM from Zones 1 and 2 were greater ($P \leq 0.05$) than the ME in SBM from Zone 3 and corn. The ME of SBM from Zone 4 was not different from the ME of SBM from Zones 1–3. Net energy in SBM from Zones 1 and 2 was greater ($P \leq 0.05$) than the NE in SBM from Zone 2 and corn. Net energy in SBM from Zone 4 was greater ($P \leq 0.05$) than corn but not different from other zones. Overall, GE, DE, ME, and NE were similar for SBM from the Northern, Eastern, and Southern United States, but DE, ME, and NE were decreased for SBM from the Western United States.

Key Words: energy, pigs, soybean meal