DAFTAR PUSTAKA

Aditia, E. L., A. Yani, dan A. F. Fatonah. 2017. Respons fisiologis sapi Bali pada sistem integrasi kelapa sawit berdasarkan kondisi lingkungan mikroklimat. Jurnal Ilmu Produksi dan Teknologi Hasil Peternakan. 5 (1): 23-28.

Al-Haidary, A. A., E. M. Samara, A. B. Okab and K. A. Abdoun. 2013. Thermophysiological responses and heat tolerance of saudi camel breeds. IJCEBS. 1(1): 2320–4087.

Aland, A., L. Lidfors, ang I. Ekesbo. 2002. Diurnal distribution of dairy cow defecation and urination. Animal Behaviour Science. 78: 43–54.

Alzahra, W. 2010. Pengaruh lingkungan mikroklimat terhadap respon fisiologis sapi Bali pada bahan atap kandang yang berbeda. Institut Pertanian Bogor.

Anonim[a]. 2018. Iklim Muara Bungo. https://id.climate-data.org/asia/indonesia/jambi/muara-bungo-972239/#climate-graph. (diakses tanggal 3 Desember, 2018).

Anonim[b]. 2018. Scottish Weather. University of Strathclyde. Glasgo. whttps://www.strath.ac.uk/media/ps/sees/informationandadviceteam/Scottish_Weather.pdf.pagespeed.ce.wgjCtw0uoW.pdf. (diakses tanggal 21 Desember, 2018)

Anton, A., L. M. Kasip, L. Wirapribadi, S. N. Depamede, and A. R. S. Asih. 2016. Perubahan status fisiologis dan bobot badan sapi Bali bibit yang diantarpulaukan dari Pulau Lombok ke Kalimantan Barat. J Ilmu dan Teknologi Peternakan Indonesia. 2(1): 86-95.

Aritonang, S.B., R. Yuniarti, Abinawanto, I. Imron, and A. Bowolaksono. 2017. Physiology response of indigenous cattle breeds to the environment in West Sumbawa Indonesia. American Inst of Physics. 1862: 1-4.

Athar, M. 2002. Oxidative stress and experimental carcinogenesis. Indian Journal Experimental of Biology. 40: 656-667.

Barendse, W. 2017. Climate adaptation of tropical cattle. Annu. Rev. Anim. Biosci. 5:133-50.

Barker J.S.F. 2009. Defining fitness in natural and domesticated populations. In: J. Van der Werf, H-U. Graser, R. Frankham and C. Gondro. Adaptation and Fitness in Animal Populations. pp. 3-14. Springer, New York.

Benezra, M. V. 1954. A new index for measuring the adaptability of cattle to tropical conditions. J. anim. Sci. 13: 1015.

Berman, A. 2004. Tissue and external insulation estimates and their effects on prediction of energy requirements and of heat stress. J. Dairy Sci. 87: 1400-1412.

Berman, A. 2011. Invited review*:* Are adaptations present to support dairy cattle productivity in warm climates. J. Dairy Sci. 94: 2147-2158.

Bertipaglia, E. C. A., R. G. Da Silva, V. Cardoso, dan L. A. Fries. 2007. Hair coat characteristics and sweating rate of Braford cows in Brazil. Livestock Science. 112: 99-108.

Bohmanova, J., I. Misztal, and J. B. Cole. 2007. Temperature-Humidity Indices as Indicators of Milk Production Losses due to Heat Stress. J. Dairy Sci. 90: 1947–1956.

Brown-Brandl, T. M., R. A. Eigenberg, dan J. A. Nienaber. 2006. Heat stress risk factors of feedlot heifers. Livestock Science. 105: 57–68.

Brown-Brandl, T. M., R. A. Eigenberg, J. A. Nienaber, dan G. L. Hahn. 2005. Dynamic response indicators of heat stress in shaded and non-shaded feedlot cattle, Part 1 : Analyses of Indicators, Biosystem Engineering, vol . 90: 451-62.

Bulitta, F. S., S. Aradom, and G. Gebresenbet. 2015. Effect of transport time of up to 12 hours on welfare of cows and bulls. Journal of Science and Management. 8: 161-182.

BVM, E. H and S. MRCVS. 2018. Heat stress in cattle. https://www.farmacy.co.uk/newsletter/195-heat-stress-in-cattle. (diakses tanggal 3 Desember, 2018).

Castanheira, M., S. R. Paiva, H. Louvandini, A. Landim, M. C. S. Fiorvanti, B. S. Dallago, P. S. Correa and C. McManus. 2010. Use of heat tolerance traits in discriminating between groups of sheep in central Brazil. Trop Anim Health Prod. 42: 1821–1828.

Da Silva, R. G., N. La Scala Jr., and H. Tonhati. 2003. Radiative properties of the skin and hair coat of cattle and other animals. Trans. ASAE. 46(3): 913-918.

Das, R., L. Sailo, N. Verma, P. Bharti, J. Saikia, Imtiwati, and R. Kumar. 2016. Impact of heat stress on health and performance of dairy animals. Veterinary World 9(7): 260-268.

De Almeida, A.M. 2018. Improving animal production and health in the tropics-the challenge of humankind. Trop Anim Health Prod. 50: 1177.

De rensis, F., I. Garcia-Ispierto, and F. Lopez-Gatius. 2015. Seasonal heat stress: Clinical implications and hormone treatments for the fertility of dairy cows. Theriogenology. 84: 659-666.

Dikmen, S and P. J. Hansen. 2009. Is the temperature-humidity index the best indicator of heat stress in lactating dairy cows in a subtropical environment?. J. Dairy Sci. 92: 109–116.

Eniolorunda, E. Fashina, dan Aro. 2009. Adaptive physiological response to load time stress during transportation of cattle in nigeria. Journal of Archive Zootechnology. 58 (222): 223-230.

Fanta, M. 2017. Physiological Adaptation of Holstein Frisian Dairy Cattle in Ethiopia. Journal of Biology, Agriculture and Healthcare. 7(1): 67-78.

Gebremedhin, K. G., P. E. Hillman, C. N. Lee, R. J. Coillier, S. T. Willard, J. D. Arthington, and T. M. Brown-Brandl. 2008. Sweating rates of dairy cows and beef heifers in hot conditions. ASABE. 51 (6): 2167-2178.

Gebremedhin, K. G. and B. Wu. 2002. Simulation of sensible and latent heat losses from wet-skin surface and fur layer. Journal of Thermal Biology. 27: 291–297.

Gaughan, J. B., T. L. Mader, S. M. Holt, and A. Lisle. 2008. A new heat load index for feedlot cattle. J. Anim. Sci. 86: 226–234.

Hansen, P. J. 1990. Effects of coat colour on physiological and milk production responses to solar radiation in Holsteins. Vet. Rec. 127: 333–334.

Hansen, P. J. 2004. Physiological and cellular adaptations of zebu cattle to thermal stress. Animal Reproduction Science. 82–83: 349–360.

Handiwirawan, E. dan Subandriyo. 2004. Potensi dan keragaman sumberdaya genetik sapi Bali. Wartazoa 14(3): 50-60.

Hernandez-ceron, J., C. C. Chase-Jr., dan P. J. Hansen. 2004. Differences in Heat Tolerance Between Preimplantation Embryos from Brahman, Romosinuano, and Angus Breeds. Journal Dairy Science. 87: 53-58.

Hillman, P. E., C. N. Lee, J. R. Carpenter, K. S. Baek, and A. Parkhurst. 2001. Impact of hair color on thermoregulation of dairy cows to direct sunlight. ASAE Paper No. 014031. St. Joseph, Mich. ASAE.

Hutasuhut, U. 2015. Pengaruh ketinggian tempat berbeda terhadap respon fisiologis, produktivitas dan reproduksi sapi potong [tesis]. Universitas Sumatera Utara.

IMS. 2001. Animal science [breeds of beef cattle]. Instructional Materials Service. Texas A&M University. 2588 TAMUS. College Station. Texas: 77843-2588. http://www-ims.tamu.edu (diakses tanggal 8 Desember 2018).

IUPS Thermal Commission. 2001. Glossary of terms for thermal physiology. The Japanese Journal of Physiology. 51(2): 245-280.

Kendran, S., Damriyasa, I. M., Dharmawan, N. S., Ardana, I. B. K., Anggreni, L. D. 2012. Profil kimia klinik darah sapi Bali. Denpasar: Jurnal Veteriner. 13(4): 410-415.

Kubkomawa, I. H., O. O. Emenalom, and I. C. Okoli. 2015. Body condition score, rectal temperature, respiratory, pulse and heart rates of tropical indigenous zebu cattle. IJAIR. 4(3) : 448-454.

Mader, T. L., M. S. Davis, and T. Brown-Brandl. 2006. Environmental factors influencing heat stress in feedlot cattle. J. Anim. Sci. 84:712–719.

Maia, A. S. C., R. G., Da Silva, and C. M. Battiston Loureiro. 2005. Sensible and latent heat loss from the body surface of Holstein cows in a tropical environment. Intl. J. Biometeorol. 50 (1): 17-22.

Maia[a], A. S. C., R. G., da Silva, dan E. C. A. Bertipaglia. 2005. Environmental and genetic variation of the effective radiative properties of the coat of holstein cows under tropical conditions. Livestock Production Science. 92: 307–315.

Maibam, U., O. K. Hooda, P. S. Sharma, R. C. Upadhyay, dan A. K. Mohanty. 2018. Differential level of oxidative stress markers in skin tissue of zebu and *cross*breed cattle during thermal stress. Livestock Science. 207: 45–50.

Martello, L. S., S. L. Silva, R. C. Gomes, R. R. P. S. Corte, and P. R. Leme. 2015. Infrared thermography as a tool to evaluate body surface temperature and its relationship with feed efficiency in *Bos indicus* cattle in tropical conditions. J. Biometeorol. 13 (6): 1-6.

Martojo, H. 2011. indigenous Bali cattle is most suitable for sustainable small farming in indonesia. Reprod Dom Anim. 47: 10–14.

Mohamad, K., M. Olsson, H. T. A. van Tol, S. Mikko, B. H. Vlamings, G. Andersson, H. R. Martinez, B. Purwantara, R. W. Paling, B. Colenbrander, and J. A. Lenstra. 2009. On the Origin of Indonesian Cattle. Plos One. 4(5).

Morton, J. M., W. P. Tranter, D. G. Mayer, and N. N. Jonsson. 2007. Effects of Environmental Heat on Conception Rates in Lactating Dairy Cows: Critical Periods of Exposure. J. Dairy Sci. 90: 2271–2278.

Nawaan, S. 2006. Daya Tahan Panas Pada Sapi Peranakan Simmental, Peranakan Ongole Dan Sapi Pesisir. Jurnal Peternakan Indonesia. 11 (2): 158-166.

Niyas, P. A. A., K. Chaidanya, S. Shaji, V. Sejian, R. Bhatta, M. Bagath, G. S. L. H. V. P. Rao, E. K. Kurien, and V. Girish. 2015. Adaptation of livestock to environmental challenges. J. Vet. Sci. Med. Diagn. 4: 3.

Nuriyasa, I. M., G. A. M. K. Dewi, and W. S. Yuspardi. 2016. Micro climate and body dimension of the Bali cattle that reare feed lot at difference altitude. IJAIR. 5 (4): 2319-1473.

Okourwa, M. I. 2015. Effect of coat characteristics on physiological traits and heat tolerance of dwarf sheep in South-South, Nigeria. International Journal of African and Asian Studies. 11: 2409-6938.

Oliveiral, S. E. O., C. C. M. Costa, Jr. J. B. Souza, J. P. A. F. Queiroz, A. S. C. Maia, and L. L. M. Costa. 2011. Solar radiation levels tolerated by lactating Holstein cows in a semi-arid region: A study about its effects on behavior. 19th International Congress of Biometeorology. https://www.researchgate.net/publication/216739913_Solar_radiation_levels_tolerated_by_lactating_Holstein_cows_in_a_semi-arid_region_A_study_about_its_effects_on_the_behaviour. (diakses tanggal 3 Desember, 2018)

Ominski, K. H., A. D. Kennedy, K. M. Wittenberg, dan S. A. Moshtaghi Nia. 2002. Physiological and production responses to feeding schedule in lactating dairy cows exposed to short-term, moderate heat stress. Journal Dairy Science. 85: 730–737.

Pocay, P. L. B., V. G Pocay, J. M. C. Starling, and R. G. Silva. 2001. Physiological responses of predominantly white and predominantly black holstein cows under direct solar radiation. Ars Veterinaria. 17(2): 155-161.

Porto-Neto, L. R., A. Reverter, K. C. Prayaga, E. K. F. Chan, D. J. Johnston, R. J. Hawken, G. Fordyce, J. F. Garcia, T. S. Sonstegard, S. Bolormaa, M. E. Goddard, H. M. Burrow, J. M. Henshall, S. A. Lehnert, and W. Barendse. 2014. The genetic architecture of climatic adaptation of tropical cattle. Plos One. 9(11): e113284.

Pradana, A. P. I., W. Busono, dan S. Maylinda. 2015. Karakteristik sapi madura betina berdasarkan ketinggian tempat di kecamatan galis dan kadur kabupaten pamekasan. J. Ternak Tropika. 16 (2): 64-72.

Prayaga, K.C., and J. M. Henshall. 2005. Adaptability in tropical beef cattle: genetic parameters of growth, adaptive and temperament traits in a *cross*bred population. J Exp.Agri. 45: 971-983.

Purwantara, B., R. Noor, G. Andersson, and H. Rodriguez-Martinez. 2011. Banteng and Bali cattle in indonesia: status and forecasts. Reprod Dom Anim. 47: 2–6.

Reinhardt, C. D., M. L. Hands, T. T. Marston, J. W. Waggoner, dan L. R. Corah. 2012. Relationships between feedlot health, average daily gain, and carcass traits of Angus steers. The Professional Animal Scientist. 28: 11–19.

Ribeiro, N. L., E. C. P. Filhoa, J. K. G. Arandas, M. N. Ribeiro, E. P. Saraiva, R. Bozzi, and R. G. Costa. 2015. Multivariate characterization of the adaptive profile inBrazilian and Italian goat population. Small Ruminant Research. 123: 232–237.

Riley, D. G., J. E. Sawyer, dan J. O. Sanders. 2015. Trigonometric functions representing annual winter coat shedding and regrowth in Angus cows. Department of Animal Science, Texas A&M University, College Station, TX 77843, USA. Livestock Science. 180: 41–46.

Sejian, V., R. Bhatta, J. B. Gaughan, F. R. Dunshea, and N. Lacetera. 2018. Review: Adaptation of animals to heat stress. Animal. The Animal Consortium. pp: 1-14.

Serang, P. M., I. N. Suartha, dan I. P. G. Y. Arjentinia. 2016. Frekuensi respirasi sapi Bali betina dewasa Di sentra pembibitan sapi Bali Desa Sobangan, Kecamatan Mengwi, Kabupaten Badung. 8 (1): 25-29.

Shiota, A. M., S. F. dos Santos, M. R. B. dM. Nascimento, A. R. F. Moura, M. V. de Oliveira, and I. C. Ferreira. 2013. Physiological parameters, hair coat characteristics and thermal gradients in nellore heifers in summer and winter in tropical environment. Biosci. J. 29(1): 1687-1695.

Silanikov, N. 2000. Effects of heat stress on the welfare of extensively managed domestic ruminants. Livestock Production Science. 67: 1–18.

Singh, S.V., S. Soren, Beenam, A. K. Singh and S. Kumar. 2013. Heat Tolerance Indices for Cattle and Buffalo. National Dairy Research Institute, Karnal-132001 (Haryana) India. pp: 270-272. https://www.researchgate.net/publication/262495543. (diakses tanggal 12 Desember, 2018)

Suprayogi, A. G. Alaydrussani, dan A. Y. Ruhyana. 2015. Nilai Hematologi, Denyut Jantung, Frekuensi Respirasi, dan Suhu Tubuh Ternak Sapi Perah Laktasi di Pangalengan. Jurnal Ilmu Pertanian Indonesia. 22 (2): 127−132.

Suranjaya, I.G., I Nyoman, A., Indrawati, R.R. 2010. Faktor-faktor yang mempengaruhi produktivitas sapi Bali di wilayah binaan proyek pembibitan dan pengembangan sapi Bali di bali. Majalah Ilmiah Peternakan. Vol. 13 (2).

Stowell, R.R., 2000. Heat stress relief and supplemental cooling. In: Dairy Housing and Equipment Systems. Natural Resource, Agriculture, and Engineering Service (NRAES), Conf. Proc. Publ. No. 129, Agricultural and Biological Engineering Department, Cornell University, Ithaca, NY.

Septyana, Y., S. I. A. Rais, M. Y. Fajar, dan I. Isroli. 2016. Korelasi umur terhadap respons fisiologis pedet sapi perah. [Seminar Nasional Program Studi Peternakan UNS]. Semarang: UNS. https://www.academia.edu/29220049/Korelasi_Umur_Terhadap_Respons_Fisiologis_Pedet_Sapi_Perah. (diakses tanggal 5 Desember, 2018).

Sugiyono. 2008. Metode Penelitian Kuantitatif Kualitatif dan R&D. Bandung: Alfabeta.

Svejdova, K., M. Soch, A. Simkova, L. Zabransky, B. Cermak, I. Novotna, D. Jirotkova, A. Svarcova, and T. Frejlach. 2015. Body surface temperature of cows in the stable. Towards Climatic Service. 9: 1-4.

Talib, C., K. Entwistle, A. Siregar, S. Budiarti-Turner, and D. Lindsay. 2003. ACIAR Proceedings. No. 110. https://ei-ado.aciar.gov.au/sites/default/files/TalibEtAl(2003)SurveyPopulationProductionDynamicsBaliCattleExistingBreedingPrograms.pdf. (diakses tanggal 5 Desember, 2018).

Troxel, T. R., M. S. Gadberry dan P. A. Beck. 2016. Temperature, relative humidity, and dew point of 6 commercial trailer compartments during summer transportations of beef calves in the mid-South. The Professional Animal Scientist. 32: 461–469.

Tsegaye, S. dan H. Ebrahim. 2018. Benefits of farm animals genetic adaptation: a review. European Journal of Experimental Biology. 8: 4-22.

Tucker, C. B., A. R. Rogers, K. E. Schutz. 2007. Effect of solar radiation on dairy cattle behaviour, use of shade and body temperature in a pasture-based system. Animal Behaviour Science. 109: 141–154.

Tucker, C. B., D. M. Weary, and D. Fraser. 2005. Influence of neck-rail placement on free-stall preference, use, and cleanliness. J. Dairy Sci. 88: 2730–2737.

Udeh, I.**,** P. O. Akporhuarho, and C. O. Onogbe. 2011. Phenotypic correlations among body measurements and physiological parameters in muturu and zebu cattle. ARPN Journal of Agricultural and Biological Science. 6 (4): 1- 4.

West, J. W. 2003. Effects of Heat-Stress on Production in Dairy Cattle. Journal Dairy Science. 86: 2131–2144.

Williamson, G. dan W. J.A. Payne. 1993 Pengantar Peternakan di Daerah Tropis. Edisi Ketiga (Terjemahan) Gajah Mada University Press. Yogyakarta.

Yamin, M., S. Rahayu, dan A. Ma'ani. 2013. Kesejahteraan domba akibat pencukuran : tingkah laku domba sebeum, saat dan setelah pencukuran bulu. Jurnal Ilmu Produksi dan Teknologi Hasil Peternakan. 1(1): 15-18

Yang, J., R. Ferreira, M. W. DuPonte, G. K. Fukumoto and B. Zhao. 2009. Growth performances of F1 angus plus calves grazing on pasture in Hawaii's tropical climate. Trop Anim Health Prod. 41: 593‑598.

Yani, A. dan B. P. Purwanto. 2006. Pengaruh iklim mikro terhadap respon fisiologis sapi peranakan fries holland dan modivikasi lingkungan untuk meningkatkan produktivitasnya. Jurnal Media Peternakan. 29 (1): 35-46.

Yani, A., H. Suhardiyanto, R. Hasbullah dan B.P. Purwanto. 2007. Analisis dan simulasi distribusi suhu udara pada kandang sapi perah menggunakan computational fluid dynamics (CFD). Media Peternakan. 30 (3): 218-228.