

### Claiming Female Agency: Women, Menstruation, and Yoga Practice

As a society we're still unpacking the recent past's near-exclusive view of female exercise as a body-shaping undertaking rather than mind-body-spirit strength and resilience empowerment. And as recently as the 1970s, before Title IX civil rights law in the United States prohibited sex-based discrimination in education, women and girls had to fight just to take part in activities like public marathons, regardless of the reasons they wanted to do so. Although we do not wish to conflate physical exercise with asana, and certainly not with a complete practice of yoga, the components of practice that today most often lead people to begin a yoga journey warrant thorough exploration.

According to the most recent large-scale survey, "The 2016 Yoga in America Study Conducted by *Yoga Journal* and Yoga Alliance," roughly 72% of Western yoga practitioners identify as female. In a field now dominated by women, what are the implications of carrying forward unexamined statements such as, "Avoid asana during menstruation"?

Even if you've never heard such advice yourself, it contributes to continuing underrepresentation or outright exclusion of women from research in some quarters and undue fear of—or unwillingness to account for—natural hormonal cycles and other physiological realities in formal studies of yoga's effects. And what are the short- and long-term effects on a new practitioner who is told to avoid inversions, for example, because they may "reverse" the menstrual flow? Mistrust of their body? Perpetuation of the "othering" of women, on both a personal and societal scale? Furthering of outdated ideas about the mysterious nature of the female system?

*We might fear hurting ourselves with this internalized dogma, which in and of itself changes the autonomic nervous system's response to associate stress and threat with physical practice, in turn creating a potential cascade of other disadvantages in how we breathe, the quality of our motor control, and our mental health.*

—Cheri Dostal Ryba

Where did such cautions actually originate in the yoga tradition, and what are the implications for research as well as for female-identifying yoga practitioners, teachers, and therapists themselves?

Here, we've gathered the work of three experts, including Dostal Ryba, who approach the topic of claims about women in yoga from a variety of viewpoints. We focus largely on menstruation, as this process is an obvious sex differentiator and an event that can significantly affect peoples' lives over the course of many years. Perhaps surprisingly, menstrual fluid—not prohibitions—is how scholar Ruth Westoby locates women in early texts of yoga. And menstruation has been and continues to be explicitly cited in rationales for excluding women from research of all kinds.

Common threads emerge from our authors' different approaches to the questions posed above: observation of the ener-



gies of the *vayus* for nuanced assessment; truly individualized, co-created practices that honor informed consent and scope of practice; unflinching consideration of our biases . . . Implicit in these discussions is the idea of listening to one's body and adopting practices that may truly be beneficial at different times in one's various cycles. This concept is important to explore given how people, especially women, are taught to mistrust their own intuitive knowing (or even outright prevented from honoring it), and is at the heart of skillfully relating to clients who may or may not have uteruses. This wisdom can help yoga therapists to work more effectively with all clients.

These writers also provide baseline education on menstruation that everyone, whether involved in healthcare or not, should have. Normalizing this most normal of physiological processes is a key part of the support that enables the embodied consent Dostal Ryba describes. Dispelling myths and taking a clear-eyed look at reactions and assumptions will also be essential to move yoga—and societies—forward in ways that support all individuals.

In brief, menstruation is the physiological process of shedding the endometrium (the innermost lining of the uterus). This completely normal event, which usually takes place every 28 days or so, has been misunderstood by both women and societies for millennia. In addition to being discouraged from engaging in physical activity, women have been excluded from social interactions during the time of menstruation—and beyond. Although menstruation has been demystified by science, misconceptions persist.

One such misunderstanding is that exercise, in particular inversions or strenuous activities, should be avoided during menstruation. Although a menstruating person may indeed prefer to avoid certain poses, there is no scientific or physiological reason to avoid any yoga poses during menstruation. Another common

belief is that inversion poses may cause “retrograde menstruation,” leading to issues like endometriosis. Fortunately, there is no evidence that inversions increase the likelihood of retrograde menstruation. Retrograde menstruation actually happens in most people who have a uterus, and only 5%–10% develop issues like endometriosis.<sup>1</sup>

As Steffany Moonaz, PhD, C-IAYT, outlines in her discussion of the far-reaching research implications of discrimination, although there is no evidence that practicing any asana would create a health issue for someone with a uterus, suggesting that the same person should avoid a practice that helps may be contrary to the nonharming virtue of *ahimsa*. Studies have specifically shown that yoga practice is beneficial for people experiencing menstrual discomfort,<sup>2,3</sup> and a 12-week yoga intervention was shown to improve breast tenderness, abdominal cramping, pelvic pain, and the need for pain medication, as well as improving mental and social health.<sup>4</sup>

Note that these articles use the term *women* in reference to persons living with a uterus. Although not all persons living with a uterus identify as women, the problems we aim to illuminate here relate to exclusion based on biological sex, not on gender identity. We acknowledge this oversimplification and refer readers to a previous article in this publication that covers important concerns for yoga therapists regarding gender and sexuality expansiveness,\* as well as the many excellent additional resources for education around these considerations.

—Laurie Hyland Robertson, MS, C-IAYT, editor in chief of *Yoga Therapy Today*; and Sarah Haag, DPT, Board-Certified Specialist in Women's Health Physical Therapy and yoga instructor

### Additional Resources

Dinsmore-Tuli, U. (2021). *Yoni shakti: A woman's guide to power and freedom through yoga and tantra* (revised ed.). Pinter & Martin.

Vitti, A. (2014). *Woman code: Perfect your cycle, amplify your fertility, supercharge your sex drive, and become a power source* (reprint ed.). HarperOne.

### References

1. Prescott, J., Farland, L. V., Tobias, D. K., Gaskins, A. J., Spiegelman, D., Chavarro, J. E., . . . Missmer, S. A. (2016). A prospective cohort study of endometriosis and subsequent risk of infertility. *Human Reproduction*, 31(7), 1475–1482.
2. Jadhao, V. S. (2019). Impact of yoga training intervention on menstrual disorders. *International Journal of Physiology, Nutrition and Physical Education*, 4(1), 1147–1149.
3. Kim, S.-D. (2019). Yoga for menstrual pain in primary dysmenorrhea: A meta-analysis of randomized controlled trials. *Complementary Therapies in Clinical Practice*, 36, 94–99.
4. Tsai, S.-Y. (2016). Effect of yoga exercise on premenstrual symptoms among female employees in Taiwan. *International Journal of Environmental Research and Public Health*, 13(7), 721.

\*See S. Inghram's “An Opportunity to Lead: Caring for Gender and Sexually Expansive Communities (LGBTQIA+),” in the Winter 2022 issue of *Yoga Therapy Today*.

## Menstrual Practice in Early Hatha Yoga



Ruth Westoby is a scholar-practitioner with a background in Ashtanga yoga. She is a doctoral researcher at SOAS University of London preparing a thesis titled, “Blood, Snake, Fire: Gender and the Body in Early Hatha Yoga.” This research was carried out with a scholarship from the Consortium for the Humanities and the Arts South-East England, and has appeared under the title “Raising Rajas in Hathayoga and Beyond” in the scholarly journal *Religions of South Asia*; it has also been presented at the American Academy of Religions (2021).

I began my doctoral research looking for women in premodern Sanskrit sources on hatha yoga, particularly the early texts, that is, those from the first half of the second millennium CE, from the 11th century Amrtasiddhi to the 15th century Hathapradipika.\* Looking for women in a canon written by men for men and about men is problematic for various methodological and theoretical reasons. There are very few references to women, whether practitioners or not. However, one fruitful line of inquiry has been to follow female fluids—to find women via their menstrual blood.

Some contemporary yoga schools advise women to adjust their practices during menstruation. In ashtanga yoga, women are advised not to practice during the first 3 days of menstruation, and this may be reflected in a reduced monthly practice fee. In Iyengar yoga, women are expected to let their teachers know if they are menstruating and are then given a different practice. Various reasons are given for adjusting practice during menstruation. I am a researcher working on Sanskrit textual sources, and in this article I focused on Indian historical sources to explore menstrual yoga practice. Perhaps these now-global forms of yoga draw on traditional Indian purity laws that, for example, forbid women entering certain places, such as some temples, while menstruating. Perhaps explanation is to be found in yogic body teachings in hatha yoga, where the downward-moving energy of *apana vayu* is to be turned upward and joined with the upward-moving *prana vayu*, such as in Amrtasiddhi 12.6. The basis of the prohibition on practice during menstruation may be that if menstruation is governed by *apana vayu*, one should allow this flow to continue downward and outward during menstruation rather than reverse it.

When we look at discussion of menstruation in the textual sources, however, a very different picture emerges.

There is some evidence in early hatha writings on the use of female sexual and menstrual fluids in yoga praxis. The practice of *vajroli mudra* is the drawing upward of semen through the penis.<sup>1</sup> A few sources suggest that women can do the same practices for the same benefits as men: specifically, the drawing upward of menstrual fluid, or *rajas*, similar to male practitioners drawing semen upward.

Here I draw on the early texts, many of which are not widely available in translation, to draw out what discussion of menstrual

practice there is. If you were expecting prohibitions on women practicing inversions during menstruation—or on practicing at all—I think you will be rather surprised.

## Rajas: Female Menstrual and Sexual Fluid

Rajas means both menstrual and sexual fluid in early Indian thought. A different meaning of rajas is that of one of the qualities of material nature (*gunas*), where it is thought of as passion and vitality and occurs alongside darkness, heaviness, or inertia (*tamas*) and truth, beingness, or purity (*sattva*). Here our concern is with rajas as the vital fluid of procreation, menses, and sexual fluid. Menstrual blood is differentiated according to the stages of the menstrual cycle and associated fertility, and according to perceived purity or impurity. The male correlate of rajas is semen, referred to as *bindu* (drop), *retas* (semen), and/or *shukla* (white, pure, bright).

*From the Amrtasiddhi's male celibate internalization and reversal of embryology we have come all the way to glimpsing an empowered and independent female practitioner who draws up and protects her own rajas.*

Throughout the hatha corpus comments about women are largely reserved to admonishments to male practitioners to avoid women as deleterious distractions from their practices or metaphors that turn on women's sexual availability. In the later texts where women were explicitly considered appropriate candidates for practice, they are grouped with other marginalized people, such as supposedly "lower" castes, and assigned apparently more basic practices, such as mantra repetition.

The early writings, however, reference women as practitioners in relation to vajroli mudra, this upward urethral suction of sexual fluids. As is the case in some tantric sexual ritual, it may be that here women were accoutrements, consorts of male practitioners, who provide the means of accomplishing ritual without themselves accruing the rituals' rewards. However, there is some evidence in the hatha texts that suggests women were practitioners for their own spiritual or soteriological benefit, or liberation (*moksha*) from the rounds of rebirth (*samsara*). These moments frame glimpses of women who are skilled in yoga, practice for their own objectives, achieve spiritual accomplishments or powers, and are named yoginis.

## Rajas in the Hatha Corpus

Rajas first occurs in these texts in the 11th century Amrtasiddhi, the first text to teach the physical practices later known as hatha yoga. The Amrtasiddhi derives from a celibate male context of *vajrayana*, or tantric Buddhism, according to scholars such as James Mallinson.<sup>2</sup> Perhaps here rajas is considered a substance that occurs in men.

In a spiritual involution of creation, the yogi interiorizes and reverses this flow for power and immortality. The text describes how in the "real world" rajas and bindu unite externally and people are created. However, the yogi internalizes and reverses this in a sort of DIY "spiritual embryology." The Amrtasiddhi's seventh chapter on bindu teaches a model according to which the falling down of bindu

from its location in the head leads to death, whereas the preservation of bindu leads to life and immortality. Significantly, the Amrtasiddhi states that bindu is of two types: male (seed or *bija*), and that which arises in women (rajas). Bindu is described as like the moon; rajas is like the sun and red, situated in the *yoni* (source, womb, or vagina), and enveloped by the goddess element (*devitattva*). The spiritual embryology is the internal union of these two essential fluids that makes one a yogi (Amrtasiddhi 7.1, 7.7, 7.8). If the context of this text is a male celibate community, then rajas must be considered to also arise in men.

The 13th century Dattatreya-yogashastra contains a similar passage with this stark difference: Half the necessary products are to be obtained from a separate person, a biologically female individual. The Dattatreya-yogashastra urges the practitioner to acquire milk and *angirasa*, a cryptic substance likely to be menstrual blood. According to Dattatreya-yogashastra 153–157,

A man should strive to find a woman devoted to the practice of yoga. Either a man or a woman can obtain success if they have no regard for one another's gender and practise with only their own ends in mind. If the semen moves then [the yogin] should draw it upwards and preserve it.<sup>3</sup>

The meanings of milk (*kshira*) and *angirasa* are contentious. In this context *kshira* is likely milky male semen, though it could simply be cow's milk used to practice vajroli, and a ritual substitute for semen.

Like *kshira*, *angirasa*, literally "fluid of the body," is a cryptic term. Is it menstrual blood? The Bhṛatkecariprakasha, an 18th century commentary on the 14th century Khecarividya, glosses *angirasa* as rajas. The "*rasa*" of *angirasa* may also refer to the first ayurvedic bodily constituent (*dhatu*) of chyle, which is the first evolute of digestion. The constituents are thought to transform via a series of increasingly subtle evolutes, the last of which is semen and menstrual blood. This understanding is corroborated by the 13th century Dattatreya-yogashastra. So here, *angirasa* is likely to be menstrual blood.

Two newly available southern manuscripts of the Dattatreya-yogashastra give a further 30 verses. They are similar to the 15th century Hathapradipika and 17th century Hatharatnavali. These manuscripts specify that a *woman* should find a *man* knowledgeable in yoga with whom to practice. It has not yet been possible to date these new manuscripts.

These verses seem to be picked up by the Hathapradipika, which is popularly recognized as the authoritative text of hatha yoga: Here, women may practice vajroli. To paraphrase the Hathapradipika, a woman who draws up the semen of a man and protects her rajas through vajroli is a yogini. She loses none of her rajas, and her internal resonance (*nada*) becomes bindu. Bindu and rajas are combined and then contained in her body. She is a yogini who from upward contractions (*akuncanat*) preserves (*raksayet*) her rajas, as a result of which she'll know the past and the future and become a *khecari* (one who moves the sky): a flying yogini (Hathapradipika, 3.84–85, 3.91, 3.99–102).

## Drawing up Rajas

From the Amrtasiddhi's male celibate internalization and reversal of embryology we have come all the way to glimpsing an empowered and independent female practitioner who draws up and protects her own rajas.



What should we understand from this injunction to protect rajas? How could it be performed? Unfortunately the text gives us no answer. We can speculate that the technique could be a form of *nauli* or *uddiyana bandha* where the abdomen is drawn backward and upward, resulting in a vacuum in the urethra. In relation to effect, is this an upward movement of energy or substance? Would the effect be a temporary or permanent refinement of menstrual blood? Could it even cause a suspension of menstruation? In relation to male practitioners of vajroli mudra it is not physiologically possible to draw semen into the head. Hence the meaning here could be more energetic than ontological. In a prosaic attitude to sex, once men have attained the preservation or stabilization of semen (*bindudharana*), they can sleep with as many partners as they like and not lose their seminal essence. Is the same true for women? Could this be a permanent cessation of menstruation, a radical form of birth control?

The Indian hatha sources are silent on these questions. However, the Chinese *nudan* sources are not. The practice of stopping menstruation, or voluntary amenorrhea, is a signature feature of *nudan* (female-oriented Chinese inner alchemy). These are practices that aim toward a woman's immortality through physical and mental transformation. Voluntary amenorrhea is first attested in 1310 in the *Annals of the Wondrous Communications and Divine Transformations of the Sovereign Lord Chunyang*, where we read that "a 16 year-old girl who, to escape her parent's plan to marry her off, hides away on a mountain. Here she meets an old man who tells her: 'I will slay your Red Dragon.'"<sup>4</sup> *Nudan* is fully developed around the 16th century and describes techniques for deliberately halting menstruation, a practice known as "slaying the red dragon." *Nudan* developed from *neidan*, non-gender specific inner alchemy that began in the Tang dynasty around the late 8th–9th centuries, and consolidated in Zhong-Lu sources from the 10th–12th centuries. (See Fabrizio Pregadio's 2019 book *Taoist Internal Alchemy: An Anthology of Neidan Texts*.)

Zhong-Lu texts apply alchemical imagery and language to earlier regimes of corporeal practice, especially "embryo respiration" and "reverting vital essence to repair the brain." *Nudan* refers to inner alchemical practices for women, and the shift toward *nudan* from *neidan* occurs from the late Ming (1368–1644) and early Qing (1644–1911) dynasties onward.

Slaying the red dragon in *nudan* sources is the refinement of menstrual blood and diminishment of the flow until it stops altogether. In addition, the breasts shrink and the body becomes androgynous. The slaying of the red dragon, however, is only the first stage in *nudan*. A female practitioner would then follow the same procedures as a man and is expected to attain success more quickly.

On the basis of current research, it is speculative to suggest that the Indian and Chinese sources are connected, and that the hatha texts could be describing the deliberate halting of menstruation that is more systematically accounted for in *nudan*. However, comparison between the Chinese and Indian sources on the specific topic of menstrual practice may shed some light on practices for women in the hatha yoga texts. With this comparison in mind, though speculative, it is possible to suggest that raising rajas could be voluntary amenorrhea.

Some might question the desirability of halting menstruation. As well as spiritual or soteriological objectives, such a practice would have social implications—contraception, celibacy, and purification—that also relate to ideas about liberation.

This article has sketched a picture of menstrual practice in early hatha yoga very different from current approaches to menstruation in yoga classes. The hatha sources that say women can draw rajas upward differ greatly from prohibitions on women practicing modern yoga postures during menstruation. Contemporary practice may draw on these early sources in relation to an analysis of *apana vayu* governing menstruation and therefore consider it best not to reverse and raise it while menstruation is in progress. However, the historical sources also offer us a glimpse of a much broader and complex approach to menstruation and the possibilities of yoga practice and liberation, whether prosaic birth control or spiritual liberation. **YTT**

#### References

1. Mallinson, J. (2018). Yoga and sex: What is the purpose of vajrolimudrā? In K. Baier, P. K. Maas, & K. Preisendanz (Eds.), *Yoga in transformation: Historical and contemporary perspectives* (pp. 183–222). Dev Publishers and Distributors.
2. Mallinson, J. (2020). The Amṛtasiddhi: Hathayoga's tantric Buddhist source text. In D. Goodall, S. Hatley, H. Isaacson, & S. Raman (Eds.), *Saivism and the tantric traditions: Essays in honour of Alexis G. J. S. Sanderson* (pp. 409–425). BRILL.
3. Mallinson, J. (2013). *Translation of the Dattatreyayogaśāstra, the earliest text to teach hathayoga*. Academia.edu.
4. Valussi, E. (2008). Female alchemy and paratext: How to read "nūdan" in a historical context. *Asia Major*, 21(2), 153–193.
5. Eskildsen, S. (2004). *The teachings and practices of the early Quanzhen Taoist masters*. State University of New York.

\*The version of the Hathapradipika referenced by this article is the forthcoming critical edition from the Light on Haṭha Yoga research project.

## Sex Representation and Inclusion in Yoga Research: Implications for Science and Society



Steffany Moonaz, PhD, C-IAYT, is a career researcher studying yoga for chronic pain. She serves as associate research director at Southern California University of Health Sciences and adjunct faculty at the Maryland University of Integrative Health. She is founder and director of Yoga for Arthritis (<https://arthritis.yoga>) and author of Yoga Therapy for Arthritis.

### Research Ethics, in Brief

Atrocities have occurred in the name of scientific research. There is a long history of experimentation on human subjects that treats individuals as less than human, especially those who are already otherized, marginalized, and minoritized by the ruling societal norms. At the same time, scientific research with human subjects can lead to groundbreaking discoveries that benefit both the individual study participant and society. In this way, research is a

powerful tool that is inherently neither good nor bad but can be used in ways that are either ethically sound or not.

Unethical research conduct may have reached its grim nadir in the 20th century, but it continues to this day. While the human experiments carried out by the Nazis were particularly gruesome, the Nuremberg Code<sup>1</sup> that followed did not prevent further horrific human-subjects research from occurring, including the Tuskegee syphilis study on Black Americans, the Willowbrook hepatitis studies on special-needs children at a residential school, the Tearoom Trade study on gay men, and the Milgram experiments,<sup>2</sup> to name only a few.

The Declaration of Helsinki and the Belmont Report further strengthened protections for human research subjects. In the effort to eradicate unethical practices and to achieve parity, human-subjects research is now overseen by ethical review boards that are responsible for ensuring that ethical conduct is upheld in all research involving humans, with particular regard for vulnerable populations who may be at greater risk for exploitation and harms—as has been demonstrated, for instance, by the difference in laboratory reference values for African Americans that has resulted in undertreatment of poor kidney function.<sup>3</sup>

There are three main ethical tenets in human-subjects research today.

1. Respect for persons: Individuals should be treated with autonomy, and those without autonomy should be protected.
2. Beneficence: Maximize benefit and minimize harm.
3. Justice: The burdens and benefits should be fairly distributed.

When a research study, whether experimental (like a clinical trial) or observational (like a survey), is proposed, it must be reviewed by an ethics board that considers the project through the lens of these three principles. Ethics committees may require changes to the proposal or may reject a project that does not sufficiently adhere to these principles. Such committees (called institutional review boards [IRB] in the United States) should include diverse representation, including scientific experts, non-scientists, and community members who will bring varied perspectives to the process.

## Research Essentials

Some people consider yoga so apparently safe compared to other experimental interventions that ethical oversight is not a central concern. As a yoga researcher and a former IRB chair, I believe it is important to continuously ask ourselves difficult questions and consider our own ethical blind spots and the harm they might cause.

*The existence of prevailing wisdom does not excuse us from also undertaking systematic scientific inquiries to confirm or refute such notions.*

Yoga research does indeed have an ethical problem in that the burdens and benefits are not fairly distributed. Yoga research participants tend to be educated White women, who have greater access to quality healthcare and greater access to privately available yoga. To resolve this, it is important that the sample of participants in any research study aims to represent the larger population from which it is drawn, rather than those who are most conveniently recruited or studied.

If I am conducting a yoga study for persons with knee osteoarthritis (OA), the sample in my study should share characteristics with the broader population of people living with knee OA. This means that my study sample should be older and more female with larger bodies than the general population. If my sample includes mostly thin, middle-aged, White women, I do not have a representative sample. This is problematic for a few reasons. It means that my findings won't be *generalizable* to the broader population with knee OA—or perhaps to the yoga therapy client in front of me. What happens in my study of thin middle-aged women might be very different from what happens for older women with larger bodies. If my sample is mostly White, college-educated, and middle-income, this presents additional problems to the generalizability of my findings.

Beyond this issue of generalizability, the bias of my sample reduces benefit to some segments of the knee OA population, including older women, those with larger bodies, racialized individuals, and those with fewer resources. If I decide without strong rationale that yoga is unsafe for older people and therefore exclude them from the study, I cannot answer important questions about the impact of yoga for older persons with knee OA. Conducting research with a sample that is biased due to lack of intentional recruitment efforts is problematic; intentionally excluding segments of a clinical population from research is even more so. Just as historically unethical research overburdened vulnerable populations, it is also possible to underbenefit such groups.

While too much yoga research is conducted in biased samples that overrepresent White, college-educated women due to a lack of intentional recruitment efforts,<sup>4</sup> some yoga research also intentionally excludes female-bodied people on the basis of their sex. (I will discuss one such case in the next section of this article.)

Research is an iterative process in which each individual research study adds to a growing collection of generalizable knowledge that can then be applied to clinical care with individual clients or groups who share similar characteristics. The more we know, the more nuanced our research questions become. In the early stages of any area of inquiry, we are relying on reasonable hypotheses to formulate research questions, often gathered through anecdotal observations. Until we've gathered data systematically, we are relying on prevailing wisdom or professional expertise to guide us, which limits us to just two of the three legs of evidence-informed practice (expertise, client preference, and the best available research evidence). The existence of prevailing wisdom does not excuse us from also undertaking systematic scientific inquiries to confirm or refute such notions or to add further nuance and clarity. An example is the idea of an ideal “dose” of yoga practice. Prevailing wisdom might suggest that yoga should be practiced daily or weekly, but we cannot know the effects of these differences until we explore them systematically. This process of inquiry does not conflict with yoga philosophy, but rather aligns with it.<sup>5</sup> In yoga, we practice the same keen observation and informed decision-making that are foundational to science.

*If we want to understand the effects of yoga for symptom management, we do a disservice to research participants and to the scientific evidence by limiting the opportunity for individualization within the practice.*

## Yoga and Menstruation: The Research Vacuum

Most yogis are aware of the prevailing wisdom concerning yoga practice during menstruation. Often it is recommended that physical practice be avoided or modified during menstruation. There may be anecdotal evidence that some asana may be uncomfortable for some persons, or there may be a reasonable rationale for the conservation of energy during menstruation. However, *we do not have evidence* that asana practice during menstruation is harmful. In fact, scientific evidence suggests that physical activity during menstruation may be beneficial.<sup>6</sup> When individuals are instructed to avoid yoga practice during menstruation, this advice may actually be more harmful than helpful; if given in the context of a research study, it may be unethical. Let me explain how this can be so.

1. If people who menstruate are instructed to avoid physical yoga practices, they are necessarily receiving a lower dose of yoga than those who do not menstruate. This may be reducing the potential benefit for these study participants. This is a violation of beneficence (maximizing benefit and minimizing harm) without strong rationale.
2. Because this limitation necessarily affects some types of people and not others, it is an unfair distribution of benefits and harms.
3. Because there is no scientific evidence that physical activity should be avoided during menstruation, this practice does not respect the individual autonomy of each study participant to decide whether their symptoms or energy level are in alignment with execution of physical practices.

### Embodied Consent Requires the Opportunity to Consent

Any informed consent process should clearly articulate potential benefits and harms and allow each individual participant (regardless of sex) the autonomy to decide whether they want to participate and ensure that they understand their right to pause or terminate participation at any time. The practice of insisting that someone avoid physical practice during menstruation is discriminatory and removes both personal autonomy and potential benefit. Instead, individuals might be cautioned that they might have discomfort or less energy during menstruation and may choose to adjust their practices or refrain from physical activity during this time.

During the 2021 Symposium on Yoga Research (SYR), a study of yoga for women with polycystic ovarian syndrome was presented.<sup>7</sup> An attendee asked the presenter about yoga practice during menstruation, stating, “It is not recommended to do yoga during the menstrual cycle except restoration and relaxation techniques...It is difficult to do asanas during the menstrual cycle.” This comment came from a male attendee.

As a person who menstruates, I will state personally that it is absolutely not difficult to do asana during any phase of the menstrual cycle. In my life as a professional dancer, sprinter, and marathon runner, I have never felt the need to refrain from physical activity during menstruation. In fact, I find that such activity is invigorating for the body and uplifting for the mind. I experience benefits from exercise during menstruation just as I do during any other time. This may not be true for other people, but I do not believe that women should be told what is difficult for them to do

with their own bodies. If a woman wants to focus on restorative practices during menstruation, she should absolutely feel empowered to do that. But she should also feel empowered to focus on restorative practices if she had a poor night's sleep or is experiencing overwhelming stress, or just because that's what feels right for her body that day. In research, in clinical practice, and in society, women's bodily autonomy is a basic human right. Women have historically been diminished, ostracized, and even shamed because of menstruation.<sup>8</sup> It is woeful to see women continuing to experience the pathologizing of normal body function and the policing of bodily decisions by institutions and persons of power.

As it turns out, this particular study did remove all physical practices from the intervention during menstruation. Although there were different yoga practices during the follicular and luteal phases of the menstrual cycle, participants did not engage in any asana during menstruation, which makes up a large portion of the follicular stage. The practice during the follicular state was a gentler practice, eliminating a sun salutation sequence that some participants may have enjoyed or derived benefit from during menstruation, whether it be slowed down or modified to meet their needs at that time or practiced as it would be during the rest of the follicular stage. The presenter noted that this decision was made to maintain uniformity in practice for all participants.

*Research participants should represent the larger population rather than those who are most conveniently recruited or studied.*

As a researcher, I would suggest that there is a balance between uniformity and individualization. If I am working with people who have arthritis, I offer variations in the asana according to the needs and limitations of each individual. This helps to maximize benefit and minimize harm in alignment with research ethics. It also helps participants to foster self-awareness and make informed choices about the physical practice that will also serve them in daily life. If we remove the opportunity to choose, we are teaching participants that they should be limiting themselves based on external guidance rather than personal discernment. If we want to understand the effects of yoga for symptom management, we do a disservice to research participants and to the scientific evidence base by limiting the opportunity for individualization within the practice.

### What About Hormones?

Beyond the problematic recommendation that all women refrain from yoga practice during menstruation is the exclusion of women from research in general because some of them menstruate. In another 2021 SYR presentation, a keynote speaker shared impressive findings from decades of yoga research resulting in more than 200 peer-reviewed research publications.<sup>9</sup> In summarizing the characteristics of these studies, he specified that study participants were overwhelmingly male. In explaining this, he stated, “Mostly we have picked males because several studies have involved autonomic functions and we know that women during menstrual cycles would have variation particularly in autonomic variables.” In other words, women were excluded from hundreds of studies on yoga's autonomic effects because they menstruate.

Many factors influence autonomic function. It is impacted by sleep patterns, stress levels, age, physical activity, and,



yes, hormonal variations—in *all persons*. In research, we use comparisons between groups or within groups to look at general patterns in the data. If a sample is large enough, the *signal* of the effect will be greater than the noise of individual variations. Excluding women from research on the basis of sex is not only unjustified but also has real consequences:

1. It reduces generalizability of all research findings. When autonomic function is studied only in men, we cannot know what the effects would be for women, meaning that the findings do not apply to half of the world's population.
2. It reduces potential benefit for those who were not able to participate in the research on the basis of sex.
3. It pathologizes women's bodies by suggesting that they cannot be studied because they menstruate, despite the many other fluctuations and variables involved in autonomic function. And despite the fact that men have hormonal changes and fluctuations, too.

If there is concern about how menstruation might impact the effects of yoga on autonomic function, this can be studied. Research data can also be analyzed to look for any differences in effect on the basis of sex. It is relevant to note that male ejaculation results in changes in autonomic function,<sup>10</sup> perhaps with shorter duration, but I am not aware of any research that asks men to report this change, nor aims to exclude men from studies of autonomic function on this basis.

## Why Representation Matters

The exclusion of women from research is not a victimless decision. In a clear example, the pathophysiology of heart attacks in women was poorly understood for decades because studies were conducted in men, who exhibited signs and symptoms that, as was later discovered, often differ in women. This resulted in delayed intervention and worse outcomes for women experiencing heart attacks because their warning signs were unknown and therefore undetected (see, e.g., de Marvao et al.<sup>11</sup>).

In the field of yoga, which is now overwhelmingly dominated by women, it is important to consider whether the recommendations we are making in both research and in clinical practice are in the best interest of the populations we serve and the profession as a whole. It is our job as scientists—or as evidence-informed yoga therapists—to systematically gather data that may confirm or refute prevailing wisdom. Perhaps women overwhelmingly find asana uncomfortable and prefer restorative practices during menstruation. Instead of making that assumption for us, perhaps we could be asked. Perhaps this could be verified by asking us.

Study participants can and should be instructed in interoceptive awareness to inform practice decisions that minimize menstrual discomfort, as we do with other observed bodily sensations during practice. This, after all, would be an important contribution to the science as well as to helping individuals to realize yoga's transformational potential. **YTT**

### References

1. Shuster, E. (1997). Fifty years later: The significance of the Nuremberg Code. *The New England Journal of Medicine*, 337(20), 1436–1440. <https://doi.org/10.1056/NEJM199711133372006>

2. Spelcey, R., & Busse, K. (2021). The history of human subjects research and rationale for institutional review board oversight. *Nutrition in Clinical Practice*, 36(3), 560–567. <https://doi.org/10.1002/ncp.10623>
3. Tsai, J. W., Cerdeña, J. P., Goedel, W. C., Asch, W. S., Grubbs, V., Mendu, M. L., & Kaufman, J. S. (2021). Evaluating the impact and rationale of race-specific estimations of kidney function: Estimations from U.S. NHANES, 2015–2018. *EClinicalMedicine*, 42, 101197. <https://doi.org/10.1016/j.eclinm.2021.101197>
4. Cramer, H., Langhorst, J., Dobos, G., & Lauche, R. (2015). Associated factors and consequences of risk of bias in randomized controlled trials of yoga: A systematic review. *PLoS ONE*, 10(12), e0144125. <https://doi.org/10.1371/journal.pone.0144125>
5. Sullivan, M. B., Moonaz, S., Weber, K., Taylor, J. N., & Schmalzl, L. (2018). Toward an explanatory framework for yoga therapy informed by philosophical and ethical perspectives. *Alternative Therapies in Health and Medicine*, 24(1), 38–47.
6. Dehnavi, Z. M., Jafarnejad, E., & Kamali, Z. (2018). The effect of aerobic exercise on primary dysmenorrhea: A clinical trial study. *Journal of Education and Health Promotion*, 7, 3. [https://doi.org/10.4103/jehp.jehp\\_79\\_17](https://doi.org/10.4103/jehp.jehp_79_17)
7. Kukoleva, J. (2021, Nov. 15–17). *Yoga therapy for polycystic ovary syndrome (PCOS)* [Conference presentation]. Symposium on Yoga Research, Online.
8. Bobel, C., Winkler, I. T., Fahs, B., Hasson, K. A., Kissling, E. A., & Roberts, T.-A. (2020). *The Palgrave handbook of critical menstruation studies*. Palgrave Macmillan.
9. Sharma, M. (2021, Nov. 15–17). *Importance of translational yoga research for evidence-based clinical practice* [Conference presentation]. Symposium on Yoga Research, Online.
10. Alwaal, A., Breyer, B. N., & Lue, T. F. (2015). Normal male sexual function: Emphasis on orgasm and ejaculation. *Fertility and Sterility*, 104(5), 1051–1060. <https://doi.org/10.1016/j.fertnstert.2015.08.033>
11. de Marvao, A., Alexander, D., Bucciarelli-Ducci, C., & Price, S. (2021). Heart disease in women: A narrative review. *Anaesthesia*, 76(Suppl. 4), 118–130. <https://doi.org/10.1111/anae.15376>

## Respecting Cyclical Wisdom and Embodied Consent



*Cheri Dostal Ryba, FME, C-IAYT, is the author of Pelvic Yoga Therapy for the Whole Woman: A Professional Guide, published by Singing Dragon. She supports people globally with online private and group yoga therapy and educational offerings such as the forthcoming “Inhabit” program.*

As yoga therapists, we value honesty. *Satya* (nonlying), one principle from the *yamas* (yogic rules of restraint), asks us to live and practice with truthfulness and integrity. Yet misinformed generalizations about women in yoga have long caused misunderstandings of, or outright disrespect for, the power of cyclical life-force energy in female bodies.

In the modern, developed, and well-nourished world, menstruation involves between 35 to 40 years of a person's lifespan, during which they can accumulate approximately 7–8 years' worth of time spent bleeding—depending on how many children the person has and whether they breastfeed. If yoga seeks to exclude those who menstruate, imagine how much benefit they will miss over those years if they're kept off the mat and out of class during their periods? This stigma is even more severe in far too many developing

countries where girls may be disallowed from attending school after beginning to menstruate or monthly during their bleeds (see, e.g., [www.unicef.org/press-releases/fast-facts-nine-things-you-didnt-know-about-menstruation](http://www.unicef.org/press-releases/fast-facts-nine-things-you-didnt-know-about-menstruation)).

*Generalizations about how we adapt practices can be useful as a starting point but quickly become dangerous sound bites when accepted as absolute truth.*

Although hormonal cycles are named and mostly known biologically, the experience of living this rhythm will vary for each person. In the textbook *Yoga Therapy Foundations, Tools, and Practice*, Uma Dinsmore-Tuli, PhD, C-IAYT, wrote in her chapter “Respecting the Presence of Shakti: Cyclical Wisdom and Menstruality Consciousness in Yoga Therapy for Women’s Health” that the body in its cycles and seasons is “the holy text to be studied closely.”

In this article, I provide key considerations regarding practicing cyclically and how reprioritizing embodied consent will build more skillful, nourishing discernment for practitioners.

## Physiological Satya

Decreased estrogen during menstruation, throughout the menopause transition, and after can cause dryness in the urogenital and vaginal tissues as well as a decreased responsiveness in the pelvic floor muscles. Not to mention the consequences of not maintaining an active lifestyle or strength training, we can see overall decreases in tissue integrity, endurance, and strength as we age.

From the perspective of currents of energy in the body, menstruation and birthing a child are grand processes of *apana vayu*, or the downward, eliminating current. We may become more sensitive and open during these times of expansion and release. These phases can be met with nourishment, patience, and introspection and may be brought to a sense of completion through a purposeful closing, a coming back to oneself as whole and intact. Physiologically it makes sense to modify practices according to the menstrual cycle or season of life, as well as to sustain a life-long, adaptive exploration of physical fitness and sexual pleasure to offset the possible effects of these hormonal changes.

My own practice in my 20s and early 30s included long-distance running and cycling, vigorous asana and intense inversions, and a leaner-than-average body composition. Now, in the depths of mothering and “householding” at 40, my practice has evolved to allow for deeper rest and more space during menstruation, prioritizing sleep and mental health, and accepting my softness. I’m back to running casually, my inversions are more restful, and I’ve taken up weight training again—this time with an eye on longevity. My commitment to practice is steadfast. The *expression* of my practice changes. My day-to-day and seasonal choices aren’t based on hierarchical half-truths I inherited from teachers or lineages. I decide based on my lived experience and whispers from my body, years of professional expertise, and the guidance of trusted mentors.

*Could we learn to dwell in discerning possibility together? What would that be like?*

## Building Context

Outdated and unfounded claims like “don’t practice inversions (or asana at all) during menses” create a fear and mistrust in our bodies. We may long for familiar practices that truly feel nourishing but avoid them as a consequence of such statements. We might fear hurting ourselves with this internalized dogma, which in and of itself changes the autonomic nervous system’s response to associate stress and threat with physical practice, in turn creating a potential cascade of other disadvantages in how we breathe, the quality of our motor control, and our mental health.

These claims lack context, leaving students powerless and uninformed. As yoga therapists, we likely know myriad variations to modify the quality and impact of an inverted posture, for instance. For someone with prolapse who feels increased heaviness or pressure right before their period; a student who feels their incontinence is exacerbated with the hormonal fluctuations during menses; or perhaps another person who deals with pelvic pain, lower-extremity edema, and vulvar discomfort while bleeding, a gentle and restorative inversion may allow “offloading” of the volume of the uterus from the pelvic floor tissues and could help restore venous and lymphatic freedom and flow in the groin and pelvic bowl, thus bringing relief.

Generalizations about how we adapt practices can be useful as a starting point but quickly become dangerous sound bites when accepted as absolute truth. Blanket statements will always not apply to some subset of the audience for which they’re intended. As our field matures and yoga therapists build discernment, we gain insight about conditions and populations and how to reason and select practices based on the individual before us. Let’s remember that this is the essence of yoga therapy—meeting each client within their fluctuating lived experiences through a customized practice.

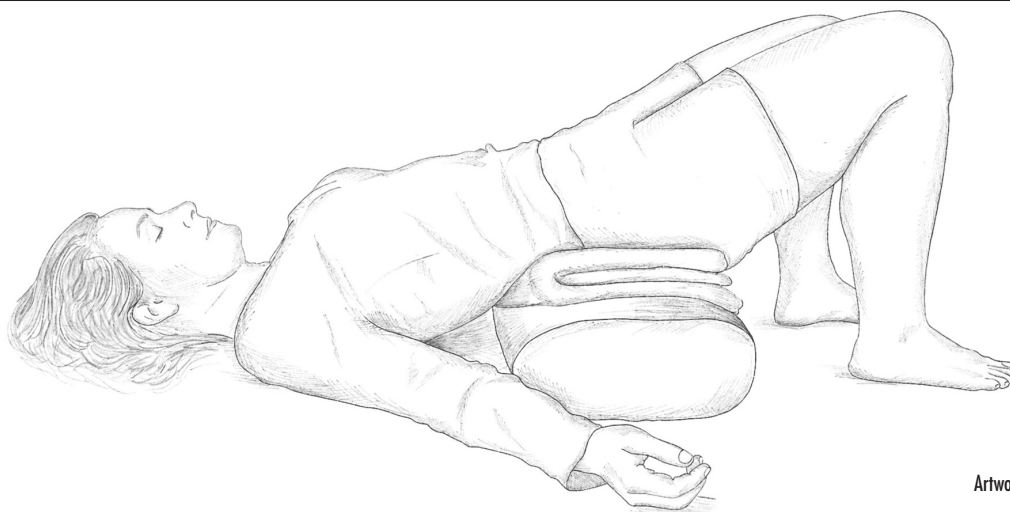
What might truly increase risk or symptom presentation for some may indeed feel glorious, integrated, and useful for others. Practitioners who have placed their loyalty in the interoceptive truth of their own sensations know how to monitor outcomes during and after a practice. They build discernment by tracking their experiences truthfully. When we know how to listen to our bodies, we know what’s right for us in each moment. As yoga therapists, we facilitate this knowing by engaging in dialogue with clients to help them articulate their experiences and make informed choices.

## Reclaiming Inner Authority

I believe we’re moving through a period of reclamation with periods, menopause, pelvic health, maternal wellness, and more—in healthcare conversations at large and now in yoga. As noted by Dr. Moonaz elsewhere in this collection of articles, research must include more diverse samples of our society. The evidence base for the therapeutic relationship’s value is growing and gaining traction in clinical practice. We’re asking better questions. Women are waking up to their independence and power, and taking up the reins of their own embodied education to get to the heart of how their needs ebb and flow.

Cyclical wisdom has become more mainstream, with the advantage of social media, the tireless work of indigenous educators, and a growing number of women’s health advocates. As practitioners and patients, let’s all realize we get to hire (and fire) the members of our healthcare teams. We can seek out providers who





Artwork by Evelyn Rosario Andry.

demonstrate the values we live by and who understand the intersections of our personal, environmental, and collective well-being to support hormonal vitality across our lifespans.

Embodied consent doesn't happen just on the mat or in navigating touch with a yoga therapy client. The skillful self-witnessing we develop in yogic practice comes with us into sexual activity and receiving medical care. We set the pace of a medical visit by bringing questions to the table and by voicing our needs in the moment. One way we can do this, for example, is in asking the provider to pause during a pelvic exam if we feel tension, pain, or emotion arise. We can ask them to go slowly and to tell us what they're going to do before it happens. Everyone deserves this kind of collaborative, person-centered care.

Yoga therapists are uniquely positioned to model this ideal, and to assess and care for the entire person through integrative approaches to well-being. Such a salutogenic model focuses on moving us toward health and thriving and not solely on the pacification of symptoms. In many cultures, people have been led to believe periods are a curse, when in fact they can be a celebrated, comfortable rite of passage and provide regular times for reflection and wisdom. We can expand our yoga therapy scope by studying menstruation as a fifth vital sign; normalizing birth, postpartum care, and menopause; and learning how to support these seasons with lifestyle habits and yoga. We can also learn how these seasons can affect uterine volume and weight, pelvic floor muscle response, relative tissue dryness and lubrication, mood, and more.

In terms of assessment, we need to remember to focus on what is normal for the client in front of us, as each person's experience of menstruation is unique. The frequency, length, quality, and severity of their periods and pelvic health symptoms, or absence thereof, and changes in their symptoms all give us important baseline information to work with when observing change over time through reassessment.

## Building Discernment and Skill Together

We all want answers, and we've been led to believe that a quick fix is possible. "Just show me the best exercises for my condition. Give me the short list of what's safe to do during prolapse, postpartum, menstruation." The truth is, healing takes time—often longer than we want it to—and this short list or quick fix rarely exists.

What we're getting better at as providers for women's healthcare is the assessment and nuanced delivery of a plan. Instead of telling a postpartum mother not to lift things or a woman with prolapse not to run, we need to gain skills and strategies to modify and titrate their exertion so as not to aggravate symptoms, and to support them in building more resilience, endurance, strength, and awareness, ultimately helping them to love, care for, and appreciate their bodies for what they *can* do.

We don't get to decide someone's fate as the provider—the consent sits squarely in each person's hands to do what they feel is best for their body. Could we learn to dwell in discerning possibility together? What would that be like?

Although I will vehemently challenge the generalization that women are to be excluded altogether from practicing asana during normal biological processes, I do feel we're simultaneously waking up to the sage advice "just because you can doesn't mean you should." At the same time we've been conditioned to believe we can't practice asana while bleeding, the capitalistic culture around us says that if we want to prove we're strong, independent women we mustn't ever stop or slow down. Both extremes attempt to force us into a lose-lose situation.

We can always practice through every stage of life and each time of the month—yet *what* we practice and *how* we meet ourselves need to embrace the cyclical, changing self with devotion, compassion, and curiosity. By paying attention, we can grow wise.

Sometimes that looks like getting outside to breathe hard and sweat or moving through a vigorous vinyasa flow, whereas other times it will look like a luxurious stack of bolsters awaiting with the invitation of deep, restful stillness. Although inversions often felt good throughout my cycle in my 20s, now at 40 they often create eye and throat pressure and discomfort in the premenstrual time and during the first few days of bleeding. For each person, the concept of if, when, and how they approach inversions—or any other practice—will need to be assessed internally on a case-by-case and day-to-day basis. A wise practitioner is willing to reconsider and change course when their sensations warrant, and we cannot possibly glean these highly personal insights if we cease all practice because of unfounded claims.

Bottom line—as both providers and practitioners of yoga therapy—we need to be informed and educated about our evolving physiological needs, check our own biases, and greet our bodies and our practices each day with a full heart and fresh eyes. **YTT**