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A MICROGENETIC APPROACH TO CREATIVITY AND MYSTICISM

Jason W. Brown^{1(A,B,D,E,F)},
Bruce Duncan MacQueen^{2(A,D,F)}

¹ Center for Cognition and Communication, New York, N.Y., USA

² Institute of Psychology, University of Gdańsk, Gdańsk, Poland

SUMMARY

Creative insight and mystical union differ as to depth of withdrawal, which is a way of saying how closely they are bound to the phenomenal world. The difference between the creative and the mystical reflects disparities in the descent. The similarities reflect the common process through which descent is achieved. Neuropsychology is critical in revealing the imaginal undersurface of veridical objects as phases through which descent occurs. Religious and nature mystics share similar patterns of personality, preparation, austerities, concentration, withdrawal and de-structuration. The major difference is the ground of union with god or nature, which for many amounts to the same thing. The religious mystic overcome with god's love is like the nature mystic who drowns in a mother-sea of elation. In both, the self is relinquished for a categorical primitive prior to individuality. In mystical retreat, the ground of drive preserves the core self and a totality of felt emotion that is experienced as oneness with god or the Absolute. The descent is less pronounced in creative reflection, when the empirical self enjoys subtler feelings or affect-ideas. In the suspension of the intentional, the indefiniteness of aim, passivity and openness, ideas and images rise into consciousness out of syncretic or metaphorical thought.

¹ In this paper, "artist" refers to all those who work in a creative way, in different forms of art but also in science, mathematics, philosophy and other fields. When the artist is distinguished from the scientist, this will become clear in the text.

*"I may not hope from outward forms to win
The passion and the life whose fountains are within"*

Coleridge

INTRODUCTION

At least since Plato, madness has been associated with inspiration in the artist and poet, while descriptions of delusion, paranoia, dissociation, hallucinations and other symptoms of psychotic thought are common in mystics (e.g. Leuba, 1925). The occurrence of such pathologies in celebrated mystics such as Suso or St. Theresa, and to a marked degree in sects such as yoga, together with an extraordinary sensitivity, have led some to dismiss the mystic as a lunatic and his or her visionary truths as delusional. Here, we are not concerned with the truth of art or ultimate reality, nor with the turn of mind that may be a pre-requisite, or accompaniment, of its attainment, but rather with the mental process of truth-seeking in modes of thought independent of any judgment on their outcome.²

The study of the Ucs has revealed a succession of categories prior to the actualization of the final category into an image or object (Brown, 1997; 2005; 2007). The retreat into the deep subjective is, thus, a withdrawal to the categories before the arousal of language, behind the visible and the palpable. This withdrawal is the path to mystical insight and to what Goethe called the pool of the creative Ucs. Certainly, the lives of the mystics are not so dissimilar from those of many artists, and the creative experience has features in common with mysticism. While the libertarian spirit of some artists may seem in contrast to the asceticism of the mystic, social norms are defied in both by an unconventional, at times outrageous personality. In spite of the tendency for exaggeration, the mystic would seem a more extreme manifestation of the same trends in many artists, where the romantic ideal of the genius tends to overshadow personalities of equal ability but less flamboyant careers.

For the mystic and for many artists, ultimate reality is personal: the inward turn, the common occurrence of eccentricity or madness, of intoxication with drugs or alcohol, a variable degree of self-denial for the pursuit of the calling, the concentration and the passivity, the "flash of insight"³, the certainty, authenticity and intimacy of the experience, its deeply personal nature and uniqueness to the individual, and the passivity and the surrender that is necessary in art and mystical experience.

The austerities of the mystic – starvation, flagellation, thorns, and so on – are a more extreme expression of similar trends in the artist, in the need for

² It has been argued that mental disturbance is more pronounced in the "would-be" mystic than the true one, Plotinus, Eckhart, Blake, Augustine, Boehme, but even a cursory reading of the lives of the mystics raises objections to this claim.

³ St. Augustine wrote, "and thus with the flash of one trembling glance it arrived at That Which Is (Conf. vii.23)

alienation and isolation, or ruthless dedication, even a pact made with god or the self to limit distraction and enhance concentration and devotion (Gardner, 1993). Many mystics, especially those with prophetic visions or an accentuated passivity, have counted themselves instruments through which god communicates, but this can also occur in creative individuals. Schopenhauer believed his principal work was dictated by the Holy Ghost. If one compares the mystical and artistic genius, the similarities can be pronounced. In some individuals, the experience is identical. Blake wrote the poem "Milton" from immediate dictation in a state of mystical ecstasy.

There are also important differences. While mystical experience has been reported as sudden and unexpected, more commonly the mystic goes through a period of prolonged preparation for a trance-like state that may last but a few moments and recur briefly, once a day, a week, a year, or never again. The parables of Buddhist sutras emphasize the life of self-denial that is necessary for enlightenment and liberation. Absorption in nature, or oneness in god's love, is often the life goal. The artist also undertakes a period of preparation and learning, a stage of incubation, before the work congeals. At times, a state of inspiration that can reach near-mystical rapture may herald the process of composition, though the *Eureka* or *Aha* experience, well described by Koestler (1964), is probably over-rated. In the daily routine of writing or composing, each line or measure is intuition objectified. The artist's craft requires discipline if something original and of value is to see the light; occasionally, the work is preceded by an intense transformative insight. The whole that emerges at such a moment must recur, less vividly, if the insight is to quietly guide the elicitation of the parts, but at any given moment, only the parts are present in *Csness*. Bosanquet wrote that in drawing a figure, the artist's thought is concentrated at the tip of the pen, though once we see the finished design, we imagine the whole work was there in the beginning guiding the artist's hand.

The artist's insight, when it occurs, has the character of holism (Mehta, 1963), simultaneity, and lack of multiplicity that resemble the mystic's big Idea (Bennett, 1923; Stace, 1961). In the mystic, surrender is to the Other. Artistic wholeness is not apprehended as immersion in otherness – god, nature – but rather as a deeper sounding of the self in relation to an intuition that is the object of inspiration. In the mystic, god is that intuition or object. The experience is of the multi- or pan-modal categories of the *core self*; diffuse, without distinct content, prior to the partition of the modalities of perception and the different spheres of cognition.⁴ The artist's descent is less profound. There is consciousness of concepts. Intuition is in relation to the *empirical self* and a segment of its partition, such as music, literature or painting. The feeling is closer to *desire*, "located" in the self and its conceptual content. For the mystic, the core has an intensity that is *drive*-like, filling the subject and its cate-

⁴ Microgenetic theory holds that perceptual modalities are not recombined, but individuate from a multi-modal or synaesthetic core.

gorical primitives. Desire entails division or partiality, not wholeness, and is consequent to drive-based feelings of love in union.

The combination of an empirical self that is conscious of a profound concept and its truth and authority tend to give the artist a sense that he is a conduit for the influx of spirit, even a messianic feeling with a responsibility to implement the work and seek publicity for his efforts. Historically, the allusion to a muse is a metaphor for the mystery and receptivity of creation. The notion of a muse is an assignment to a lesser god of the spiritual power of the "divine Presence" from which everything emanates, including the power of the muse, who operates in a limited sphere of His influence. Inevitably, the (usually male) artist and the female muse, and (in the Christian tradition, the) often female mystic enthralled with a masculine god, lend a sexual flavor to creation in art and inter-penetration of god and soul in union.

The recovery from mystical exultation may accompany an account of the experience so far as it is possible, but the experience is *an end in itself*. The withdrawal is solely for the purpose of mystical experience. Even the service to others that often precedes union is for the merit of the mystic as a potential recipient of god's love. In religion, the offering precedes and justifies the Idea; in art it is the reverse. The artist is driven to share the Idea with others. This process is codified in the Talmud, which advises one not to seek god but to study so that, one day, perhaps, if you are fortunate, god will find you.

The testimony of a mystical experience is itself a tacit and solitary "artwork". One could say the mystic *is* the artist and union is the artwork. Everything goes into the creation of the mystic as an outcome of personal effort, and all this effort is for an audience of One. Few are interested to hear the story of the artist's inspiration; it is the artwork, not the Idea that precedes it, that holds our interest. A recounting of a Eureka experience is like listening to a person's dreams, which hold small appeal except for the dreamer and his analyst. However, the ancient belief that a descent into dream reveals hidden truths in the temporal world mirrors the belief that a descent into the mystical reveals hidden truths in the timeless world.

While mystic and artist have differing feelings of volition according to the degree of passivity and surrender, both feel as vehicles or channels for spiritual inspiration.⁵ The process of creative work is a fragile mystery to the artist, who feels relief, elation and gratitude when a work begins to emerge from the shadows onto a blank canvas or an empty page. Dante expressed the feeling of many artists when he wrote that, "art is the grandchild of God". Freud commented that, "whoever works as an artist certainly feels as a father to his works". A musical work, an historical treatise, a mathematical proof, visualized all at once in the mind, is not a religious experience, though it can inspire the awe and humility that are essential to religious feeling. But the artist,

⁵ Artistic and mystical trance probably also incorporate aspects of the feeling of the sublime, which can be attributed to the presence of a sense of the "here-now" against all space-time, or a point of space in relation to infinity and a moment of time in relation to eternity (Brown, 2000).

unlike the mystic, pours his religious feeling, or reverence, into the work, not into himself. Once complete, the work is detached, independent, like a child with its own life in the world, while the inspiration – conception – with which it began, having been replaced and satisfied over multiple implementations, is a near-forgotten memory. For the mystic, however, the event, not having been discharged over time, remains incandescent, real, transcendent and deeply personal.

The creative is not the *experience* of inspiration but the concept that inspires and the work that follows, to which method and skill are subsidiary. In the mystic, method is necessary to achieve the Idea, but lacking skill, nothing comes of it except personal exultation. The austerities that beckon the mystic to unity contrast with the unity of the Idea that deposits the manifold of an artwork. So, then, does the soul's union with god achieve a kind of immortality for the mystic that, for the artist, comes only with the greatness of his works. One could say that mystical union exemplifies potentiality, while the potential manifest in the Idea of the artist has value only in actuality.

The artist with an overarching vision (potential) may use various means over many occasions to revive and so empty (actualize) it. For composition, the Idea must be reinstated, implicitly and without the intensity of its first appearance. The potential is mined for content and at some point, when it is exhausted of its fertility, the work is complete, or at least should be. The greater the scope of the Idea, the more profound, the more personal and universal. The more delimited the Idea, even if strikingly original, as in scientific creativity⁶, the less personal and the closer to the world of objects. Artistic vision, tied to the material, and replete with potential, insinuates the totality or the contour of a forthcoming work if not the detail of its parts. The artist apprehends an image of the entire work, but does not drown in its totality. He retains sufficient detachment to serially revive, convey and recapture the intuited unity of the whole.

Mystical vision actualizes the fullness of its potentiality in a concrete reality in which the self is immersed. The totality of the category is an all-inclusiveness in which ultimate love and god-feeling pervade the subject in an objectless state. The passivity of immersion and the loss of self are signs of a regression to levels beneath word and image, antecedent to the individuation of content from the core self. The world dissolves and only pure subjectivity is left. The lack of content, the unitary or undivided nature of the state, the relinquishing of the empirical self, attest to its generalized, ineffable and domain-free character. In place of *Csness* of god there is objectless *awareness* suffused with spirit. The depiction of mystical vision as a direction without an object recalls studies by the Wurzburg school of psychology that posited just such an early phase in the development of a thought (*Bewusstheit*). The state also recalls accounts in mystical Judaism of creation, when a not-

⁶ See discussion in the *Creativity Research Journal* 7 (3,4) 1994

yet something that is a mere “not-nothing” takes on a direction that anticipates the birth of the world.

The characteristics of mystical states have been recounted in endless and fascinating detail by many writers, accounts that, like those of creative personalities, usually do not stray far from the stereotype. Yet even with the more conventional mind of the creative scientist, which differs in that novelty is incremental and value impersonal, there has been little or no speculation on the *psychic process* underlying creative thinking. For the artist – for all creative individuals – the descent to Ucs mind – to imagery, metaphor and fluid imagination – taps early phases in subjectivity that prefigure the objects of ordinary Csness. The series of preparatory actions leading to union requires the severance of bonds to the outside world, monastic existence, isolation and subjective retreat. The mystical ascent to heavenly planes of thought and elevated Csness in the exaltation of god-union begins with personal needs and self-sacrifice, and follows an ingoing path. The profundity of the descent, the self-denial needed for union, the frequent failure at explication, the sustained and energetic passivity, make the experience inherently solipsistic.

Every foray into oneness is an inward search⁷. The god of union, the absolute, the real, the Buddha-nature, is not found “out there” in the world of nature or god’s creation but in the mind of the seeker, in a pre-verbal field of inchoate thought and primitive emotion. William James suggested that the threshold of Csness might be lowered to admit what is usually pre-Cs. Meister Eckhart (1958ed) described a shift from the temporal order of the world to pure subjective duration. Eckhart in Christian mysticism, and Coomaraswamy in yoga (1993) described an expansion of the personal now to the infinite now of god. Nature-mystics contemplate the Absolute, or ultimate reality of nature, with a focus on a single object, but even in this method the retreat is from plurality to a single object, then to its sources in the inner life.

The principle differences between creative and mystical thinking are the depth and, thus, the selectivity of content, and the accentuation on facets of the mental life as opposed to its whole, i.e. the work of art versus pure experience. Ancillary features of religiosity or personality motivate the sphere of value, the ambition, the goal and single-mindedness of the search, the relaxation and receptivity and, consequently, the depth of self-exploration. Artistic training in composition, literature, dance, etc., leads to skill in technique, perhaps in theory as well, while religious training leads to knowledge of scripture and practice. In both there is extreme dedication. For the artist, work is religion, cult; for the mystic, the longing for perfection is an aesthetic lived in the flesh. Mystical and creative experience depends on access to early cognition in both artistic and religious domains. The truth of art or experience is an aesthetic of authenticity. The religious individual with skill in writing (Plotinus,

⁷ For example, a turning point in the life of the mystic, Mme. Guyon, occurred when a monk told her to “seek God in your own heart and you will find Him there”. (Leuba, p.75).

Kierkegaard) or painting (Blake), or the poet with mystical sensitivity (Tennyson), uncovers the creative at the depths of the mystical, while mystical feeling in an artist, even a scientist (Kepler, Newton), is often ingredient in great discovery. The scientist without a touch of the mystical exchanges wonder for curiosity, while the mystic without an aesthetic has little but the memory of a waking dream left over from loving union.

In sum, mystical experience resembles artistic insight but at a more profound level of the mind, uncoupled from topic or concept, minus the skill needed for articulation. The greater depth of the former accounts for the prominence of the core rather than empirical self, the loss of the subject/object boundary (oneness), the intra-personal locus and the greater passivity, absorption and surrender. The severity of preparation for mystical union corresponds, in art, with the dedication to learning and the acquisition of technique. The preparation is assiduous, the greater when the aim is to *become* rather than to *possess* the Idea. The first duty of god's bride is acquiescence. To be worthy is to be selfless. Self-denial is a mode of active passivity that is the primary condition of submission. In Buddhism, as in most religions, self-denial is central.

In contrast, the artist does not pursue the same path of self-denial. The passive and receptive qualities of inspiration and composition are realized only in the creative state. Mystical union is not creative; it has no content to divulge other than what it is. The totality of union overwhelms all particularities in its subsequent revelation. To describe, to discuss, to illustrate is to delimit. The category of mystical experience stands behind a manifold of possible concepts, one of which prevails in creative vision. The vision engages a sphere of content, at first explicit, say a figural, mathematic or musical "problem", but out of receptiveness comes increasing definiteness, and thus originality, as the content resolves. One sees at first dimly. Then, one becomes blind to the habitual. Finally, eyes refreshed, one sees again as if for the first time.

The artist is still bound to the temporal world of objects while the mystic has left that world for the timeless realm of god or nature. This is a *symptom* of inwardness as engagement devolves to antecedent oneness with the other. Oneness is not the coming-together of god and mystic but the reaching-down to the foundations of thought before the surfacing of individuality. The *I and the Thou* (Buber, 1958ed) do not embrace each other as in an encounter but issue from a common source, like waters flowing from the same spring.

If we presume a descent in creative and mystical thought through planes of Ucs process, what is important for this idea are: (1) the activity of developing acts, and the passivity of developing objects; (2) the elaboration of object space out of a personal space of imagery; (3) the growth of feeling out of core beliefs and values; and most critically, (4) the assumption that unrealized or non-actualized phases of the Ucs are not concrete images but *categories* of thought and perception.

ACTIVE AND PASSIVE

“The road up and the road down are the same”

Heraclitus

In creative and mystical withdrawal there is passivity to an imagined other – muse, spirit or god – who may have authority over the self. The feeling of passivity is decisive as to whether agency is felt as internal, belonging to the self, or external, transferred to the other. For example, Schopenhauer thought his great work was dictated by the Holy Ghost. The greater the self’s feeling of agency, the less the power attributed to muse, spirit or god. The self must evaporate if the mind is to be inundated. Agency and receptiveness are generated within the mental event; they are not applied to events from outside. The study of pathological cases affirms that agency depends on and develops with the occurrent state, and that the object-development is of equal importance to the feeling of agency and its locus as the action process. One could say the action discharge gives the *feeling* that an action is self-initiated⁸, whereas the object-development gives the *knowledge* that the action has occurred. There is a need to disambiguate these subtle differences. Perhaps willed movement should be restricted to the feeling of innervation, agency for the sense of free-will, and volition for consciousness of action, including choice and decision. In states of palsy, there is still a feeling of effort and will, but this is altered in sensory denervation. Without effort and the aid of vision, one cannot move a limb that is not felt. But action is not necessary for volition. When action is in abeyance the self still can evoke and “manipulate” a mental image, contemplate a past event, arouse an idea or imagine a plan for the future.

The inner bond of the mental event with action and perception or with the active and passive attitude changes each moment with the changing event. Though we sense that we can choose to act or not, a failure of action is not a sign that agency is wanting; agency, willing, volition, are in choosing and implementing, not in the choice that is made. This feeling differs on separate occasions for what appear to be similar acts. One moment I am willfully engaged in writing, with each stroke an energetic motion. The next moment, my mind is vacant, there is no impulse or will to write and the pen rests helpless in my hand. This difference, as much a function of mood as of conceptual urgency, points to the “deep structure” of the act. Activity colored by mood can give apathy and akrasia or, conversely, manic self-confidence. The relevance of mood might suggest that active and passive “roles” are additions to events, not intrinsic to them, but I believe this shows that moods arise at

⁸ The James-Wundt debate on the feeling of innervation concerned the contribution of action to the distinction of active and passive movement. Without sensory recurrence, i.e. action-perception through collaterals of its discharge, there is not only loss of the feeling of activity but the limb may be felt as not belonging to the individual or organism. A rat will chew its dennervated paw, as a person bites an anaesthetized lip

and condition pre-object phases in the micro-temporal process through which events arise.

The relation of an image to passive and active undergoes a change in mystical descent. The meditation that initiates the process, and the concentration on an object, are active processes that become passive in visionary thinking with the appearance of images or hallucinations (see below). Receptivity and openness transform to agency when a mystic receives instructions from an angel or hears the voice of god. The volitional quality of the imaginary voice is normally a property of the self, i.e. inner speech, and the relation of self to image or object. Yet, in normal states, there can be a shift in the locus of agency from the self to the image. On falling asleep, a verbal image occasionally seems to become the voice of another person. When sensory constraints are relaxed or in full dependency on the endogenous, the path outward to the world for everyday objects occurs for intrinsic images as well, and like objects, imagined others appear to “contain” their own impulsivity or volition. When a verbal image objectifies, the voice is no longer felt to be in the person’s mind; it seems to come from outside. This is pronounced in schizophrenic command hallucinations. The phenomenon is not limited to verbal imagery. In a phantom limb, the feeling that one controls an amputated limb may change to a state in which the limb itself feels active. The limb seems to “have a mind of its own” independent of the self. Similar phenomena occur with stimulation of the motor cortex. In the “alien hand” syndrome, a person may actually be choked by his own hand.

Such phenomena, and a host of others (Brown, 1988), show that the active and the passive are not opposing tendencies but parallel attitudes.⁹ In man, the feeling of volition depends, minimally, on an active feeling in movement that is generated by the action discharge. In contrast, the passivity of the object-development is completed when the image objectifies and is no longer part of the person’s mind. The many forms of imagery, dreams, memory and thought images, hallucinations and illusions, eidetic and after-images, are markers of successive phases in the object-development, and each mode of imagery has a different feeling of activity or passivity. The proximity of the image to the world or core self is one factor in volitional feeling. In the final phase of image-development, agency is replaced by passivity. This culminates in the detachment of the image and the feeling of being an onlooker to the products of one’s own imagination.

In the mystic, the complexity of the active and passive appears in the mix of pursuit and surrender. The mystic is an active seeker who pursues detachment with vigor and determination. In the artist, it occurs in the balance of confidence and receptiveness. Mystical union requires resolute commitment and absolute submission. The union that is actively sought-after is realized in

⁹ Some have argued that the tension between the active and the passive in cognition traces back to the biology of approach and avoidance in uni-cellular organisms (Schneirla, 1965), which evolves to grasping and withdrawal, extro- and introversion, and even aggressive and dependent personality types

self-abandon. The paradox is that the final passivity necessary for absorption entails a suspension of the impulse that drove the mystic to seek union in the first place. Reminiscent of the remark of how much it cost the government of India to keep Gandhi living in poverty, a healthy dose of arrogance is required to surrender the self to the Other. The combination of determination with supplication, of the quest for perfection with the admission of inadequacy, of detachment from others with the hope of communion, of the audacity in the search for god-union with the relinquishment of any vestige of autonomy, is not for the timid or faint-hearted. Absorption in god begins with self-absorption, requiring a self to which all worldly relations are subordinate. A strong will is essential to dedicate a life in service, since dedication is a means to an end – that of union – to which self-denial is preliminary. One could say with some justification that devotion and humility in the mystic are mere camouflage for so consuming an ambition that the individual actually believes he or she will achieve a personal audience with god. Hugel (1921) wrote that mystics have a “great self-engrossment of a downright selfish kind”, in which all things are grouped around a “self-adoring *Ego*.” Such narcissism, not unknown among the artistic class, is neither unique nor essential to the creative personality.

Many writers have claimed that the brain is designed for action and that knowledge is incipient or preparatory action. However, the inner life is populated mainly by perceptual images. The delay in action that is essential to thought is not filled by more action but by visual and verbal imagery. The mental correlates of action are largely perceptual (Brown, 1996). Activity arising in the outward flow of action transports the self to a goal. With the evolution of self and desire, the purposefulness of animals becomes the volition of humans. The object of desire that can be imagined as an idea for reflection is an image for the self’s enjoyment. We are spectators for our visual images, including dreams. The active quality of inner speech gives volitional feeling to language-based thought (Brown, 2004). The imagery of verbal thought, when biased to action, gives volitional feeling; when biased to perception, it seems to arise spontaneously. Generally, we are passive to what surfaces in Csness even if we feel that our thoughts are purposefully generated.

Eckermann said of Goethe, genius does not struggle to reach the heights, genius soars. In ordinary mind as well, thinking does not give thought; thought comes. And thought comes best in moments of inactivity and quiet repose when the antecedents of acts and objects come to the fore. The passivity in the relation of self to thought, or observer to observed, is an active product of the process through which objects develop. It is essential for objects to be shared and independent, and for the illusion that the objects we perceive are in the world, not in the mind. Agency is partly a by-product of choice and decision, and partly, a result of motor discharge. This is essential if the individual is to feel that his limbs are not prosthetic appendages. Were agency for images like passivity for objects, i.e. if actions fully objectified, we would feel like automata; actions would arise like objects, independent of an

actor. Were the passivity of objects to invade the action-formation, we would feel that perceptions were the outcome of mental activity, i.e. that we think up our perceptions. Such phenomena are common in psychotic states.

UNITY AND UNION

The initial phase in the “ascending series” to god-union described by writers such as St. Theresa, Bishop de Sales and Mme Guyon, begins with meditation. Leuba (1925; p 169) notes the similarity to the Buddhist and Islamic traditions. He writes that “the fundamental psychological condition of Union is passivity”, to which meditation and the ascetic life are subsidiary. Meditation leads to passivity by “arresting the activity of the mind”. The inward turn is a step back from the world, a retreat from acts and objects that relinquishes agency and replaces objects by images. Instead of an active self in relation to the world, the self is a passive observer of its own bodily and mental content. After meditation comes contemplation; this is not active thought, but attention to one object as a means of further emptying and so opening the mind for spontaneous imagery. Passivity is achieved in concentrating the mind on one object, or repeating a word or phrase, such as a mantra. Howley (1920) gave a clear description of the shift in attention from a discursive “wandering” over elements to “a fixation on one element which it draws from the storehouse of memory, and concentrates intelligence and will on this one point”, so reducing the conscious field to a minimum. The aim of the negative path of elimination is, as Spinoza put it, “to reach a bare One unencumbered by attributes, which are limitations.” In Sufism, where inwardness and spirituality prevail over the externality of law, the repetition of a word or phrase from the Qu’ran – *sika* - leads to a forgetting of self and relations to the world. This can also be achieved in repetitive motion, such as whirling. A homogeneous state of emptiness ensues as selfless mind is absorbed in a sea of unity.

Accounts of the mystical path emphasize other methods in the course of achieving union, many of which have taken on the status of formal doctrine, even if there is considerable variation in the path of each individual. Before the final oneness there are often visions and hallucinations. This is a kind of twilight Csness with an erosion of autonomy but not to the point where the self is obliterated. The withdrawal from objects to precursor images creates a “dreamy” state not unlike that of hypnagogy, epileptic aura or hypnotic trance. The outer world has all but vanished, replaced by something resembling a “lucid” dream. The agentive self that initiated the adventure has given way to the passive self of dream as an observer of its own imagery.

In contemplation, reason, thought and imagery are replaced by ardent feeling, and by the “simple gaze on divine truth” of St. Thomas. There is an arrest of inner speech and thought. Ordinarily, objects and words parse meanings and increment time. The elimination of the time order realized in words and objects uncovers deeper phases of simultaneity and syncretic meaning, the

“thoughts too deep for tears” and boundless emotions; undivided, inarticulate, generalized, ineffable. The opposition of the self and its images, concepts and feelings dissolves, and with this the dissolution of self-consciousness. Bishop Hedly wrote that he who is conscious while he is praying has not yet arrived at perfect imagery (Butler, 1922).

In the sphere of emotion, affect that in waking was distributed more or less evenly over all perceptual objects, is now concentrated into one object of contemplation. When this object is then relinquished, affect suffuses inner space and grows more intense as individuality recedes to its core, as if one traveled upstream to the source of a great river from one of its many tributaries. The outcome of this descent is surrender in union with god or immersion in the absolute of nature. The state is that of a powerful emotion, usually described as all-encompassing love. The mystic is consumed by god, the Other, as lover, great companion or fellow sufferer. According to Poullain (1912), the very center of Christian mysticism is the other as an immediate and vivid apprehension of “divine Presence”. Not to diminish the import of the union or its significance for the mystic but to align it with other modes of thought and behavior, one could suppose that mystical ecstasy is an experience akin to fully internalized sexual ecstasy that discharges a mode of pre-object mentality prior to the division of self and other.

Apart from the sexual histories of the mystics, which have been lucidly interpreted by Leuba (1925), and discussed by many writers, including psychoanalysts, the mystical experience can be interpreted in relation to ordinary sexual excitement. Love would then be a derivative of sexual drive, and the extremes of asceticism a form of masochism. Some saints, especially women, report sexual dreams of being kissed and bedded by, or married to, god. In the passage of consciousness from interest in another person to desire for that person, to the coupling with a partner who is still external, the ever-greater proximity and absorption leads to a melting of the physical boundaries of flesh and the psychic boundaries of feeling. The dissolution of the self and the inter-penetration with the other accompany a retreat from asymmetric and deliberate limb movements to automatic and symmetrical axial motility. Focal voluntary actions are replaced by rhythmic impulses. The transition is from adaptation to the world to the archaic and endogenous. The confluence of drives that are suppressed, deviant or inner-directed – repressed sexuality, hunger in starvation, fear in acquiescence, anger in self-directed austerities and mortification - coalesce in solitary rapture. The sublimation of the outer-directed drives, the loss of their objects and the muted expression of their natural realization result in a wholly subjective discharge. Mystical union is fully intra-personal. The outer world has disappeared. Motility is suppressed. A similar phenomenon occurs in REM-state dreams, where there is also paralysis. In ecstasy when visions and revelations occur, the individual is incapable of voluntary movement, unable to come out of trance at will (Poullain, 1912).

The allusion to sexuality in union particularly in the religious mystic, integrates some aspects of the uncanny to what is familiar and comprehensible. Mystical union is not an other-worldly experience beyond human understanding. To claim the phenomenon is god-inspired removes it from philosophical or psychological discourse. The parallel trend in the concept of creativity, i.e. that of the genius is inspired, implies an influx from outside or a state of supernatural possession that uncouples the creative process from what is known of mental experience. Smith (2006 and elsewhere) has described attributes of creativity in relation to experimental studies of personality development, especially the import of pre-perceptual stages in driving surface cognition, phases of affect and meaning, and the micro-temporal transition from “depth” to “surface”. Sexuality plays an important role in the ability to probe otherwise hidden or submerged levels. The allusion by students of mysticism of the importance of sexual feeling is of uncertain import but it does align the phenomenon with percept-genetic or micro-genetic phases in thought and perception.

Along these lines, to claim that mysticism is a construction of social, linguistic and religious traditions does a disservice to the universality of the experience, the commonality of its precursors, the descent into self and the pattern of expression that are found in all forms of mystical union (discussion in Forman, 1998). The religious and cultural background may determine the conditions that are pursued for descent, while the part-categories of culture and personal interest naturally guide the less profound descent in creative insight and the still more superficial objects of science. The phases of descent (Fig. 1) inhere in all human minds.

THEOCENTRIC AND NATURE MYSTICS

The mysticism of god-union is most often described in the Christian literature, but accounts resemble those of the Asian mystic who seeks communion with nature. In the latter, oneness is with the ultimately real or ground of existence, an absolute that is “super-sensual and super-rational”. If the One of union is personal it is god, if impersonal, the absolute. In the former, god is creator, in the latter, the universe is emanation (see Hughes, 1937). For Mercer (1913), the term god should be reserved for the phenomenal aspect of the absolute. The central idea in nature mysticism is that mind and nature are manifestations of the absolute. In both forms of mysticism, the *unio mystica* is achieved by a descent through the personal Ucs as the particulars of Cs experience are abdicated for a dream of holistic unity.

Mystical thought has a tendency to monism, but it would be inaccurate to portray the process as a replication of the same “stuff” of matter in increasingly complex systems. All knowledge and experience rest on the process through which mental phenomena are derived, a process that in my view can be traced back to elementary physical entities. What is continuous is the expansion, inside-out, of the internal relations, subjective aim and direction-

ality of process within the temporal extensibility of physical entities (Brown, 2000). The pantheist sees the continuum in psychic terms; the materialist sees it as physical top to bottom. Hughes argues, citing Plotinus and Augustine, that pantheism is not essential to religious mysticism.

The possibility of love-union with god does not imply that each of us has godly attributes or is a particular in the mind of god, but that individuality can be immersed in the totality of the divine. The transition from the human psyche and its material basis to a fusion (infusion) with the spirit of god is less a spiritual becoming of the person or a recession to a spiritual core than an openness to god's love. The notion that we are ideas in god's mind, or that our souls are ingredient in universal spirit, are concepts discussed in other formats, but they do not appear to inform the process of mystical retreat. This is because the god-union does not uncover an underlying oneness, but achieves unity by allowing god to enter one's being. This contrasts with the nature mystic, for whom a common process would seem to be necessitated by the continuum of psychic individuality with the physical absolute. Individual mind is a distal manifestation of the ultimate data of reality. Nature and mind may not be composed of the same constituents, but they are emanations of the underlying ground of existence. Of the various explanations of the continuum, increasing complexity with emergent features, in spite of its inadequacy, is perhaps the most widely accepted.

CREATIVITY IN ART AND SCIENCE

"one-eyed science deficient in its vision of depth"

Whitehead

The idea that mystical experience is an extreme of normal cognition and an outcome of phyletic trends brings the phenomenon into relation with evolutionary process on the one hand, and artistic and scientific creation on the other. Microgenetic theory assumes a qualitative change within the mental state in its transition to actuality. For this reason, the differences between ordinary, creative and mystical thinking are as important as the similarities. These differences have several explanations: (1) a disparity in segment or phase, i.e. relative depth of origination; (2) the extent to which concepts are partitioned, i.e. the unity or multiplicity of vision and composition; (3) the prominence or extraction of feeling, i.e. intensity, generalization and locality; and (4) the degree of objectification, i.e. the phase of concepts, or of objects.

Mysticism and creativity are grounded in personal feeling. In the former, feeling is the goal or end to which the state is directed. The intensity of feeling arises in the proximity to core drives and the non-specificity of conceptual primitives, and the temporal compression of the manifold of possibility in unrealized potentiality. In the latter, feeling follows the separation of the man-

ifold into specific occasions that generate a multiplicity of inter-locking parts. Science and philosophy are impersonal; they attempt to drive feeling out. The certainty of mystical truth and the unique vision of the artist depend on their intra-psychic locus. The mystic leaves the world the artist returns to. In both, value deposits at subjective phases in personal experience, or in concepts rather than external objects, but the final objects of art and science arising out of conceptual feeling are not dead products of thought; they radiate the intrinsic value that accompanied them into the world.

The more personal a belief, the greater the conviction in its truth, no matter how implausible it may be. Strong and unshakeable beliefs are akin to delusions in their resistance to argument and indifference to verification. Indeed, how could one authenticate a reported union with god or nature? The objects of art and science conform to the concepts behind them. To speak of deep or shallow concepts is to judge their scope, originality and explanatory power. The inwardness of mystical union contrasts with the open-ended dialectic of extra-personal science. Most scientific "facts" are provisional. The more impersonal, the more provisional, at least in principle. There is no complete objectivity, even in the most solid fact; this is evident in the ferocity of scientific and philosophical debate. Objectivity does not require an external perspective, which can never be fully achieved; rather, there is an accentuation of the distal or objectified segment of the mental state and a de-emphasis on its subjective portion. The self imaginatively inhabits the objects it perceives, or imagines that it, the self, is one of those objects. One has this experience on occasion in gazing at the body when it seems alien or dissociated, or just another object in the world. The objectivity of science is less a perspective from outside, than the subtraction of the personal in observation. The object is no longer the exclusive product of an individual imagination. For the scientist, shared objects have precedence over individual observers. This is the outcome of an observation of a reliable, eternal world in relation to the fragile, perishable self, and translates in epistemic theory to the belief that objects are the starting points of concepts.

For those who believe the path to truth lies outside the mind, the intra-personal truths of the mystic are suspect or fraudulent. In contrast, those of the artist are closer to the object world. The ideal is not intra-personal but directed to others. The truth-value in art is more in the sphere of feeling and symbolism than reason. The artist wishes to transfer to the observer his insights and emotions. Such insights may qualify as truths in that they reveal, by implementing them, concepts that cannot otherwise be submitted to scientific test. Most philosophers would grant that art reveals truths about the human condition, even if they cannot be formulated as propositions that can be falsified. It was for this reason that Goethe titled his autobiography *Poetry and Truth*. In contrast, science puts its questions in the form of propositions that are true or false. The locus of scientific thought shifts from the mind of the individual to a world of communal objects, validation and consensus.

There is a transition in every act of cognition from the phase of intuition or the pre-verbal categories that discharge in mystical experience to a conceptual richness of greater specificity, i.e. an artwork or domain of scientific inquiry. This phase leads to the objectified concepts of art, e.g. a poem, painting or performance. In art, concepts are rendered in a form that can be judged for depth and quality. In science, concepts lead to findings that can be tested and confirmed. Art and science submit their objects for extra-personal judgments. The mystic is indifferent to the judgment of others. The artist may act with indifference or disdain and reject the opinions of others, but his work will still be judged, while the scientist's trade depends on such judgments. The continuity from the personal to the impersonal reflects the relative depth or degree of inwardness that dominates each mental state.

In mysticism, the self uncovers the ground of its existence or fuses with the Other. The mystic has limited interest in the truths of extra-personal science. Perhaps he believes the scientist is deluded by appearances that have little relevance to the direct experience of deity or nature. However, a profound truth about nature must cohere with a truth about the mind; one cannot ignore the source of one's objects. One who begins with the objects of physics will not reach the mind, But, if one starts with mental phenomena, it may be possible to trace their devolution to basic entities. If so, a continuous thread runs from mind to physical nature. Nature mystics know this truth, but their insight is without content – blind concepts, as Kant put it – leaving nothing to be decided on. Mystical experience is adrift from the wider community of knowledge. The mystic does not just renounce the world; he is alienated from the illusory objects left behind in his descent. In fact, he demolishes those objects without putting forth new ones to replace them.

In sum, for artist and aesthete, for scientist, philosopher or others who work in a creative way, intuition may arise from a concept on a universal scale or one of more narrow interest. Concepts of the widest scope are fundamental categories that spill into increasingly more definite spheres of value. The immense joy of god-union that is recaptured in descent is an early, unrecognized phase in an ordinary act of cognition. This phase partitions to scientific or artistic concepts that still have a high grade of intrinsic feeling. Feeling is diminished as it distributes to concepts that point outward to the world. The exo-centric locus of scientific concepts delimits feeling to a concentration on one object or field. This is the phase of contemplation in the mystic. In the scientist, it can become a center of inestimable value. The mystic abandons objects for emptiness; the scientist retains them and fills them with value. The dedicated scientist who spends a lifetime studying a liver cell, a ganglion in the brain, a physical particle or a piece of viral nucleic acid, has enlarged that concept to a universe of value that claims a devotion that, as in mysticism, is comparable to the feeling of love.

For the nature mystic, the absolute has certain of the non-moral, impersonal and ideal qualities of the philosopher's god, such as timelessness, per-

manence and indivisibility. Process thought is inconsistent with permanence and wavers on the existence of timeless objects. For this reason, more powerful arguments are needed to support the belief in a rock-bottom ground of substantial nature. In theocentric and nature mysticism, objects vanish in a mist of ultimacy. Scientific knowledge retains those objects that mysticism discards. The generative concepts behind those objects, which are the primary instruments in the origins of theory, are reclaimed when feeling is eliminated in the quest for inter-personal assent. The elimination of emotion from scientific research is presumed to result in affect-free concepts. However, feeling is as fundamental to organic systems as energy is to matter, so much so that a metaphysics of feeling may well be prior to one of energy in physical matter. Elsewhere (Brown, 2005) I have speculated that feeling arises in the *becoming* (change) or temporal extensibility that generates an object or concept, while *being* is the duration or category created by the becoming.

Art, like mystical experience, achieves truth in perceptual immediacy. In creative thought, study and deliberation precede insight. There is a period of gestation, as conception gradually develops, followed by the labor of execution and revision. The aesthete studies an artwork for a while before understanding catches up with “gut reaction”. As in mystical knowledge, we apprehend that a work of art is profound, but we cannot always say why. The intuition feels right but cannot be articulated. Ineffability is a psychological fact, not a limitation of language. It conveys the experience of potential before it actualizes in words. The lack of words, which is a way of characterizing ineffability, is a failure of the partition of the immediacy of wholeness, which is experienced without being apportioned, without being incremented into moments by thoughts, acts and objects.

William James understood the intensity of conceptual feeling underlying rational thought when he wrote that philosophy is more a matter of passionate vision than logic, the logic coming afterwards to justify the vision. First we have the idea, then we look for support in the authority of research, tradition and opinion. The inward descent of the mystic is replicated partially by the artist. But unlike the former, the artist excavates concepts that, for the mystic, are mere way-stations in a deeper pursuit. The phase of conceptual feeling that is the starting point of art-creation for the mystic is still too much part of the world. In Buddhism, the Arhat seeks to rid himself of feeling, e.g. desire. In the final stages of enlightenment, he must eliminate concepts. This amounts to an elimination of mind, for so long as mind exists, a state of non-conceptuality would seem to be impossible. The state of “pure” or objectless *Csness* is not a mode of awareness, as in animal mind, where external objects are conserved, but an immersion, or feeling of oneness, in the categorical prime that deposits the core self (below, and Fig 1).

The outward progression in art divides a unity of conceptual-feeling into constructs with little feeling-tone, or feelings that seem non-conceptual. Put differently, conceptual feeling can go in the direction of feeling, in which the

conceptual aspect is diminished, or in the direction of concepts, in which feeling is subdued. This gives the false impression of an opposition of concept and feeling, or historically, of reason and appetite. But intense feeling still realizes a category (fear, love and so on), while abstract concepts retain an affective tone in their value to the individual. It is the feeling or value in the concept that selects it for analysis. The greater the partition, the more object-centered or external the concept, the closer the creative act is to science than to art, which even when it is displaced to a world of objects remains, in its conceptual integrity, very much a subjective experience.

To put the discussion in a more fully microgenetic context (Fig. 1), the drives, the base categories and the Ucs or core self are ingredient in a plane of cognition that discharges *internally* in mystical states. This phase gives rise to the empirical or Cs self and its conceptual feelings. The partition evokes a subjective aim that will become the intentional agent of ideas, acts and objects (Brown, 2006).

At an early, intra-personal phase of this partition, concepts of particular value arise out of core beliefs, ingrained skills and experiential memories, e.g. mathematical, musical, artistic. These concepts are penetrated by intense feeling. The intensity can be described as a flood of emotion or gasp of amazement that saturates a still inchoate concept. The intuition is gradually worked out as the concept develops into objects (parts). The whole of the insight gives rise to the particulars that exemplify it. The feeling-tone that was intense in the original concept tends to dissipate as it distributes into ideas in the mind or objects in the world.

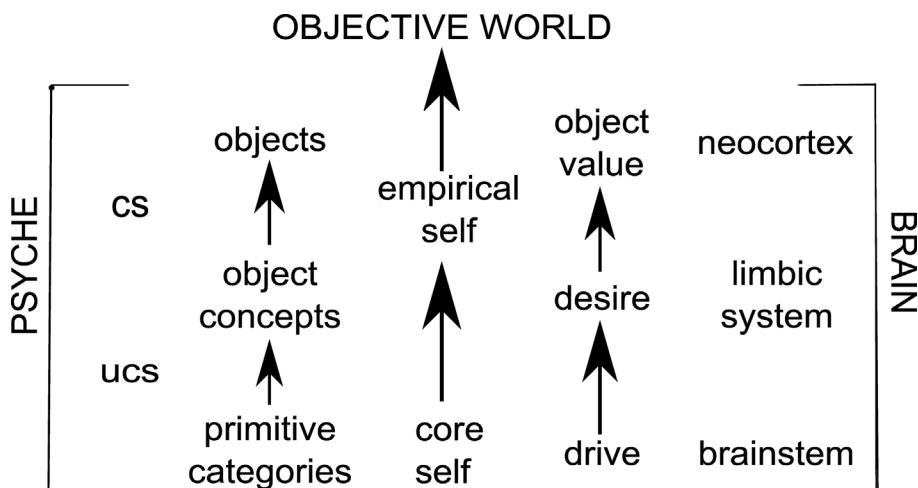


Fig. 1. The mystic withdraws to Ucs categories that are the initial phase in the mental state. In art, there is incomplete withdrawal to the phase of conceptual feeling that partitions the core. Objects that are revived are penetrated with feeling as value. The scientist also retraces this process, but lives closer to the object-world. Each mental state is a recurrent transition from core to empirical self to external world

When the individual is centered at a distal or objective phase in the implementation of the concept, say in fine-tuning a composition or revising a manuscript, the creative power of the insight, though active, is weakened in the partiality of its material. We now speak of skill or technique, the 99% perspiration of Edison's famous remark. Conrad wrote in a touching way of the uncertainty and struggle in the choice of every word. Original ideas develop in the context of experience and interest when the conceptual mind resists objectification. Whether an idea is interesting, novel or deeply original, whether it is revived in art or science, even if it remains pre-conscious in a psychotic personality, concepts of innovation and power can only arise at a phase prior to objectification. This is because concepts are not assembled from Cs elements but precede those elements and give rise to them in a sequence of recurrences.

One characteristic of creative thought is the exploitation of early phases in perceptual imagery. Much has been written of the Ucs sources of creativity, but few "mechanisms" have been proposed. Perhaps the most important of these is metaphor, which has been widely discussed in cognitive science as well as neuropsychology (Brown, 1997). For Miller (1996) scientific theories begin with metaphoric constructs. These constructs result in literal descriptions that approximate concepts of physical reality. He writes, "all our utterances about the world are metaphorical". Science is a sub-set of such occurrences. One phenomenon is described in terms of another or a surrogate is employed to achieve insight into novel fact. Koestler (1964) described creativity as a sudden convergence of two strands of thought that result in a new way of thinking. This idea has been further developed by Rothenberg (1996). The convergence of different lines of thought is another way of describing metaphor as a synthesis of contrasts, or the generation of novelty from discord. While Rothenberg dismisses the importance of regression, the ability to tap preliminary or Ucs phases of pre-logical whole-part relations, such as metaphor, is central in the creative act.

What distinguishes creative from ordinary thinking is richness of metaphoric thinking and greater access to those phases in mind where metaphor is active, as well as the ability to develop metaphors of striking originality. From a psychological standpoint, what is important about metaphor and related phenomena, such as metonymy and synecdoche, is that they are instances of whole-part relations through which topics overlap due to shared predicates, when the part implies the whole, or when certain attributes of an object serve to propagate novel constructs. An example in poetry might be a "dark" mood that becomes "night falling". Einstein's fly on a train is an example in scientific discourse. Religion is replete with metaphors and symbols. With respect to religious mysticism, an example is god as father, lover or bridegroom. If metaphor is ubiquitous in language, it is because whole-part relations are fundamental in mind and nature. The natural tendency of thought is to analysis, or the derivation of parts from antecedent wholes. The creative

step reverses this trend by a move inward to the wholes. The focus is now on the concept, context or background behind the particulars. This opens the way to a novelty generated by the multiple relations of unrealized parts. Put differently, the incomplete analysis permits the arousal of unexpected parts that are tacitly subsumed within wholes that have not yet individuated.

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Address for correspondence:
Prof. Bruce Duncan MacQueen, Ph.D.
Institute of Psychology, Gdansk University
Pomorska 68
80-345 Gdansk, Poland
duncan.macqueen@medscimonit.com