

THE METRONOME OF CONSCIOUSNESS

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Samuel Beckett's 1966 work *Ping* is generally read as a prose dramatization of the experience of a consciousness near to death, and the word 'ping' itself is taken to be non-referential. This paper examines Beckett's use of 'ping' as one of a constellation of terms which, when taken together with his frequent hospitalization in the years leading up to 1966, suggest a directly referential reading.

Since it first appeared in English in 1967, *Ping* has remained somewhat of an enigma.¹ Most critical readings have followed David Lodge's early summary of possible interpretations, which appeared the following year. This reading depends upon a distinct interpretation of the key word in the text, "ping," and will suggest that, far from being an impressionistic prose-poem, *Ping* is a directly referential text.

A highly repetitive narrative depicts a series of images of a body confined in a white space, reminiscent of one of Francis Bacon's stretched and twisted figures, contorted into a posture of ineluctable physical pain, set against a blank geometrical background. The experience related is solely that of the sensations and impressions, divorced from action; but for conscious or semi-conscious thought, the narrator is entirely passive. Yet all this is obscured behind a wall of compacted prose. The density of *Ping*'s prose style is its most immediate and most intriguing aspect; it seems condensed or undiluted. Like César's compressed sculptures of crushed cars, all the constituent elements are squashed into an uncomfortable proximity; one squints at the object, aware that it betrays the traces of a previously orderly shape, seen now through the wrong end of a telescope. In *Ping*, all the spaces between, the gaps, have been forced out; no air flows around the words. Read aloud, *Ping* enacts this asphyxia: unpunctuated but for its periods, free of pronouns and as Susan Brienza

notes, “entirely devoid of finite verbs,” (160) its monosyllabic flow of aspirated vowels, whether murmured or ejaculated, leaves the reader gasping for breath. The whole process is expiratory.

And indeed, ‘expiring’ is, according to the general critical consensus, precisely what *Ping* dramatizes. Susan Brienza describes the “standard” interpretation as being that “*Ping* portrays an agitated consciousness seemingly in the last moments of life” (173). David Lodge is inclined to see *Ping* as referring, among other things, to Christ dying in the tomb, whereas William Gass leans in quite the opposite direction, proposing that *Ping* is a version of “the first act of creation” (13). Eyal Amiran synthesizes these two readings, seeing both an end and a beginning, or re-beginning of life in the joined and bent legs of the first line: “All known all white bare white body fixed one yard legs joined like sewn.” These legs suggest to Amiran “some late embryonic stage” of development, set against the “mental sarcophagus” of the setting (172). Whichever reading is favoured, all the interpretations agree on what kind of physical entity it is that *Ping* describes, which is a single, bare white body, immobile and immured within a white rectangular enclosure. Beyond this minimal description, which is hardly a reduction, “[t]he only other narrative certainty” according to Susan Brienza, “is an imploring black eye which apparently is a minimal representation of a female character and by extrapolation a minimal suggestion of romance or its memories” (161) – a possibility which it might prove difficult to reconcile with Lodge’s reading.

With regard to the word ‘ping’ itself most commentators defer to Lodge’s least determinate hypothesis. Carla Locatelli concurs with Lodge’s assertion that “‘Ping’ itself is the most ambiguous word in the text precisely because it is the one least defined by any referential or structural function in ordinary usage” (301; qtd. in Locatelli, 69). The variation of possible referents enumerated by Lodge – that the ‘ping’ could be the noise of the ricochet of bullets, or of water dripping, of a bicycle bell, or a sanctus bell, or a typewriter bell, or indeed not a noise at all but a cypher for ‘God’ – tends to be replaced in most readings with the suspended possibility of all and none, underpinned by a critical suspicion that this enigmatic effect, that of a non-specific floating signifier, is exactly the effect intended by Beckett. In her meticulous analysis of *Ping*’s stylistic principles, Elisabeth Bregman Segrè, whilst suggesting a number of unexpectedly referential readings of

several of *Ping*'s terms, avers that "'Ping' is then most likely only a sound emitted from some outside, unrecognized source [...] The reader is thus faced with an open field of associations, and none of these associations can be definitely substantiated" (131). The repeated word 'ping' may therefore find itself reduced to a purely formal function, acting only as a term in a "pattern of repetition [which] holds the work together in a kind of spatial order," (Lodge, 293) and overwhelming the reader with its lack of significance. To seek meaning behind this asignifying rhythmic marker is, according to such readings, as futile as ignoring a sonata to concentrate on the metronome.

Ping has been set to music in its French version, *Bing*. The composer Jean-Yves Bosseur, who collaborated with Beckett, asserts that "According to Beckett, the 'bings' sprinkled throughout the text are like signals which aim to prompt a question, a change of mind, a brainwave, an interior light; they are like a tic, a nervous reflex, a shock, the image of a begging eye (that of a woman, probably), a memory" (243). That grain of doubt, the qualifying "probably," suggests we should be careful to distinguish between Beckett and Bosseur: these possibilities seem of mixed provenance. Yet it is also largely agreed by critics that the pings function as some sort of trigger of memories or images. Susan Brienza argues that the word "serves as Beckett's madeleine," proposing that the sound "suggests a sudden flash of recollection," (161) and may mark within the chronology of the text the blinking of an eye. Gilles Deleuze also sees 'ping' as an "inductive term" (159) which serves to call into being a pure image – 'pure' because it occurs prior to its representation in language and hence in any kind of narrative. Lodge too links the word with the function of memory, albeit without recourse to Proust:

We might suggest that *ping* marks the intervals between the oscillating movements of the character's consciousness from dull despair to tentative hope; though this leaves open the question of whether it is part of the discourse, or an intrusion from outside which stimulates thought in a mechanical and arbitrary way.

(300)

Lodge's question should not and need not be left unresolved. A further determinate reading may act as a better recommendation of Beckett's craftsmanship than a general one of suspended indeterminacy. Without the assumption that underpins this reading – that *Ping* is a representation of a single character's consciousness, to be identified with the "bare white body" of the text – the series of pings may indeed serve solely a formal function, without reference to the content. There are arguments against this assumption: the "bare white body" with its "Head haught eyes light blue," noted in as impersonal a fashion as the surroundings, imply an external observer. We cannot see the colour of a character's eyes whilst seeing through those eyes – and there is no suggestion in the text of a mirror. The 'voice' of *Ping*, the narrating consciousness, has a tone of impartiality; it is, as Gilles Deleuze describes it, "a very distinctive flat-toned voice, as if it were predetermined or preexisting, that of an Announcer or Opener" (159).

The alternative to identifying the voice as that of an external observer is to pose a further question: why does the speaker, or voice, or narrator, refer to his body as though it were another's? For, as well as asking ourselves, with whose eyes are we seeing? there is the problem of the text being saturated with the language of a wider set of perceptions and sensations: of light, and heat; of awareness of what is not seen, as well as what is; of memories, and of immediate physical sensations; and most crucially, of what is heard, of sounds. The more extensive and more appropriate question to ask is, through whom are we experiencing?

The word 'ping' can in fact be read referentially. It is a specifically onomatopoeic word that is and has always been echoic of the metallic noise of machines. Two of Lodge's proposed readings correspond with the term's earliest usages: the OED cites 'ping' used to refer to the noise of rifle bullets in 1835, and to the noise of a typewriter's carriage return in 1930 (the OED's illustrative example is of J.B. Priestley's usage of considerable precision, in *Angel Pavement*: "The typewriters rattled and pinged.")² The allusive context of these usages, which connect the word with death and writing respectively, also seems appropriate to Beckett's work. In 1943 the word gained a further usage, becoming the slang term for both the ultrasonic signal sent out, and the echo returned, in the use of sonar - the psalm and antiphon, as it were, of machines.³

Against the more exotic readings of Lodge and others, though not incommensurable with them, I would set a mundane biographical reading which necessitates a brief selective summary of some of the facets of Beckett's life in the years and months leading up to the writing of *Ping*. The entire work was written in the summer of 1966, during the six weeks from the beginning of July until its completion on the 18th of August. For the preceding two years Beckett had been beset with worries about his health. In the November of 1964 he had an operation for a benign tumour, leaving him with a hole in his palate which refused to heal properly. During the following spring he suffered the added complication of a dental abscess which required treatment. According to Deirdre Bair's biography, he also underwent surgery to close the hole in his mouth twice in the first six months of 1965 (581). James Knowlson's biography notes that in July of that year Beckett had surgery to place a skin graft on the wound, which operation was not entirely successful and led to a series of dental complications. In April of the following year, his sight began to fail. Diagnosed with double cataracts, he worried that he would lose his sight altogether: a fear that is written into *The Lost Ones*, as James Knowlson recognizes when he writes that the "whole text could be defined as 'myopic,'" noting how Beckett refers to one section in the first manuscript version as "une grande myopie" (536).⁴ During this period, a number of his closest friends and relatives died or became acutely ill: in January, his friend George Devine died from a coronary thrombosis; in June – the month immediately preceding the writing of *Ping* – both his brother's widow and his wife Suzanne's mother became seriously ill. Of Suzanne's mother, accommodated in the nearby Hôpital Cochin, he wrote dispiritedly that she was "recovering – to be what, a vegetable, indefinitely" (542).⁵ In the same month Beckett – who was, despite the admittedly gruesome catalogue of ailments listed above, not a vocal complainer – told Suzanne that he felt shaky and poorly, which admission no doubt constituted a significant case of tactful meiosis.

Where the writing in question appears to be a form of existentialist expression, it seems not unreasonable to revert to a materialist theory of artistic production. The infinitely variable hues and tones of the psychic environment – by which I mean the various ways in which a mind may subjectively apprehend the world – may force the artist into a restricted

zone of representative expression precisely because of the restriction of his perceptions. A salutary example of this process – indeed, it could even serve as a symbol of the process – peers out at us from the text of *Ping*. Colours in the text are invariably and repeatedly associated with the same definite objects. The body is white, as are the walls. The “traces blurs signs” are “black light grey.” The eyes are “only just light blue almost white.” This last colour, when used to describe eyes, is remarkable: it is the indistinct, pearly hue peculiar to cataracts. So much in *Ping* is “never seen” or “invisible,” and what remains is seen only vaguely. It seems rather more probable that Beckett is alluding to his own cataractal eyes than those of some imaginary blue-eyed Christ.

Once we have, as it were, medicalized one aspect of the text, the remaining clinical terms become more prominent. Beckett’s experiences during the preceding few years, of repeated hospitalization and major surgery, with all that it entails, added to which the hospitalization of his friends and relatives, all suggest an entire set of correspondences between the ‘experiencer’ of *Ping* and the patient. We might quickly discern frequent references to sutures not only in the “legs joined like sewn” and the “mouth white seam like sewn,” but also to previous episodes of suturing in the “white scars invisible same white as flesh torn of old.” The traces of life in the body are indistinct: there is only the negative physical evidence of the “invisible heart breath no sound.” The only sound to be heard, in fact, is “ping,” or “silence”; and what follows this noise of “ping” is frequently a “murmur,” a word which in its auscultatory sense refers to the rumbling rhythms of the heart under a stethoscope.⁶ How then is this “murmur” detected, and why is it so closely linked to “ping”?

I would suggest that the pings are the sound of an electro-cardiograph, one of the few machines to make this distinctive, half-musical noise. Bedside ECG monitors were first introduced into hospitals generally in the early 1960s; their novelty would have made them seem especially prominent to Beckett in the years of his repeated operations, from 1964 to ‘66.⁷ The “ping” of an ECG is akin, in function and in appearance, to a submarine’s sonar, as it is in fact a representation of what is “never seen,” “invisible.” It is a reflection returning the imprecise shadow-image of an object, in the case of sonar or, in this case, of the beating of the heart. The

visual evidence of this echo, the jagged line displayed or drawn by the oscillograph on an ECG monitor, is known as a “trace.”⁸

By this reading, the consciousness depicted in *Ping* is that of a hospital patient, probably after surgery. It is not the first time; he has had surgery before. He has cataracts, and can see little. He is weak, so weak as to be unable to detect the sound of his own breathing, or the beat of his own heart. His thoughts are obscured and obstructed by the after-effects of anaesthesia, and very likely also the fog of morphine. His sense of time passing is somewhat distorted and elastic; time seems to dilate and contract – as does his heart, weakly. Each time it does so, the machine at his bedside makes a noise – ‘ping’ – stirring him from his stupor, and stimulating him into some slightly higher thought process – an image, or a memory – than that involved in the mere tedious fug of being. Yet the thought, or image, or memory will not persist; it slips away into nothingness as the morphine and his weakness assert their more primal claims over his existence. Perhaps it is, each time and with each heartbeat, exactly the same image or memory – but it is only the hint of a beginning of thought, lost each time.

Such a determinate reading may have less allure for some readers than a more reverential, non-specific one that maintains *Ping*’s mystery. It does, however, begin to satisfy some of Lodge’s requirements for a reading of *Ping*, and to answer his question of whether the pings are “part of the discourse, or an intrusion from outside which stimulates thought in a mechanical and arbitrary way” (300). The answer is that the ping is both; it is mechanical, but it is far from arbitrary. The sound that stimulates thought is a mechanical amplification and representation of the narrator’s pulse. It orders the sequence of thought within the narrative only insofar as it is a certain reminder of continuing existence, where all other signs of life are hidden and blurred; and it determines where the text ends – and hence its length – only to the extent that when the pings cease then life has ceased: the narrating consciousness is extinct, and so is its narrative. So much is clearly marked in the final lines of *Ping*, where the oscillograph displays “no trace”; the heart gives a “last murmur”; and the image of the imploring eye gives way to the final mechanical hiccup of a terminal cardiac arrhythmia: “ping silence ping over.”⁹

What should be evident from such a reading is that the pings must serve as a structuring device for the author; they dominate the text because

they are the metronome of consciousness. As Elisabeth Bregman Segrè reveals, “word arrangements strongly suggest the unexpected interpretation of ‘one second’ as a moment of time, an instant. For every one of these ‘one second’s’ appears shortly after a sound, either ‘ping’ or ‘murmur’” (132). The intervals of time between the pings are therefore rather more regular than the consciousness’ perceptions of them; and the problem which concerns Segrè regarding this “unexpected interpretation of ‘one second’” – that “it implies an additional point of view” (132) other than that of the consciousness itself – is resolved by dint of the fact that this additional point of view is co-extensive with the experienced world: it is that of the ECG, a quasi-observer.

For a piece which Beckett struggled to edit to its final taut length, this device, anchored so closely to the consciousness’ distorted perceptions of time passing, naturally acts as a limiting influence. What in the earlier drafts is frankly a rambling stream of consciousness, the stream reduced to a series of impotent spurts and dribbles by a sort of mental strangury, becomes in the final version an ordered, pulsating physical rhythm of thought. Where Beckett has eliminated all verbs, and thereby all action or power of action, rendering the narrative one of entirely passive experience, the pings function as a way of giving the order of otherwise inchoate and repetitive thoughts an urgency of meaning.

The picture with which we are left is a particularly modern one: that of a man who hardly knows he is alive but for the machine to which he is connected, which tells him that he is alive. It is a closed circuit between man and machine. But this picture also redefines *Ping* as a text not solely about expiring, but as one which establishes a delicate, productive relation between inspiration and expiration. If the pings are in fact merely the sound generated by the narrating consciousness’ life-signs monitor, that sound is itself merely an echo and a representation of the actual signs of life in the body. Here, reference to the drafts and to the final French version of the text may clarify the extent of *Ping*’s referentiality. Beckett replaces all instances of two words, ‘bing’ and ‘hop,’ with the single word ‘ping’ in the English version. The translation is not literal: whereas ‘ping’ occurs 34 times in the English text, ‘bing’ occurs 19 times and ‘hop’ 12 times in the final French version. ‘Ping’ may be thought to be a fair equivalent of ‘bing’; the latter is the kind of word used to represent the

metallic noise as Astérix hits Obélix over the head with a saucepan; or, as Renée Riese Hubert notes suggestively, “Don Pikkedoncker dans *Fastes d’Enfer* emploie le terme *bing* lorsqu’il imite les sons de cloches” (Don Pikkedoncker in *Fastes d’Enfer* uses the term *bing* when he imitates the sound of bells; 256; my translation).¹⁰ ‘Hop’ generally serves to suggest a verbal interjection intended to provoke movement; yet it is, like ‘bing’, considered to be onomatopoeic.¹¹ I would suggest that, in the first draft in which the word ‘bing’ occurs (text 4), the alternation of ‘bing’ and ‘hop’ may signal respectively the sound of the machine, and another originary sound generated by the body. Leslie Hill has noted that the onomatopoeia of ‘hop’ “in French, translates an eructation, a glottal convulsion which explodes from the lips” (151), and this is certainly the manner in which it is voiced in colloquial expressions such as “allez-hop!”

Neither word appears in the first draft; ‘hop’ appears first in the second draft, replacing the repeated word ‘paf’,¹² and ‘bing’ only appears from the fourth draft onwards. (In that same draft, there are also introduced, though eliminated from later drafts, “Certains insectes,” a possible reference to morphine-induced formication; and “Respiration inaudible” (328), a rather clinical phrase in itself.) One would therefore read the aspirated ‘paf’ as a breath, later replaced by ‘hop’ which, *pace* Leslie Hill, would indicate something more in the nature of an involuntary clonic inspiration: a periodic involuntary inhalation which occurs when the body’s blood-oxygen level is depressed. What is therefore expressed in the oscillation of ‘bing’ and ‘hop’ in the early drafts is, as J. E. Dearlove notes of *Imagination Dead Imagine*, something “closer to the cyclic rhythm of respiration dramatized in ‘Breath’” (109), a piece conceived in the same year as *Ping*. In both pieces, the rhythm is founded on a dyad of doubly-charged words, inspiration and expiration, whose polarity divides the inhalation and exhalation of breath, but also the mental inspiration of images provoked by the pings, and the expiration of life.

This entire system of bodily semantics constitutes, in Deleuze’s term, a “ritournelle motrice” of inclusive disjunctions – described by Mary Bryden as “a recurrent characteristic of Beckett’s writing in which distinctions are not resolved, but co-exist and remain in play” (83). Deleuze distinguishes between the apparent character of two types of refrains or ritournelles, asserting that “Just as the image appears as a visual

or aural ritornello to the one who makes it, space appears as a motor ritornello – postures, positions, and gaits – to the one who travels through it” (160). The pings would therefore appear to the consciousness as a kind of synaesthetic image, provoked by inspirations of breath; whereas the expirations would repeatedly return the consciousness to an awareness of the physicality of thought.¹³ Although the Deleuzian term seems most appropriate to this quasi-linguistic, half-machinic system assembled by the inclusive disjunction of the perceiving consciousness and its life-signs monitor, I would prefer not to employ “ritournelle motrice” where its psychological equivalent – the double bind – may be used.¹⁴ In *Ping*, where in narrative terms the psychological experience of the narrator seems to be all, the paradoxical subjection of the self to an external power of that self’s own construction, such as obtains in all double bind relations, is more specific a way of describing the mutual dependence of the patient and the ECG. The rhythms of breathing, of systole and diastole, inspiration and expiration (in both senses of both words), are doubly-bound to their visual and sonic representations by a machinic system, an ECG which emits pings and records traces. This machine, although it is external to and separate from the body, is the factor of a negative feedback, telling the body how close it is to expiration and so, perversely and paradoxically, provoking the inspiration of images. It is a miracle of rare device.

By this reading, the predicament which Beckett depicts in *Ping* may seem an unusual and extreme one, though it is consonant with his recurrent themes of physical insufficiency and mental aporia. Hugh Kenner perhaps came closest to describing *Ping* in such a way when he considered the uniqueness of the *mise-en-scène*, describing it as “a setting so overwhelming, so arbitrary, so referrable to mechanical superintendence perhaps, or to some unknown physical laws, that it determines what little can occur” (180). Yet if we permit the specific situation to stand in for a more general condition – our modern relation with technology – *Ping* becomes a more suggestive text, representative of a much more common experience. Philip K. Dick, a specialist of fictions dealing with men who are unable to distinguish between themselves and the machines to which they are attached, describes this relation more directly: “The greatest change growing across our world these days is probably the momentum of the living toward reification, and at the same time a reciprocal entry into

animation by the mechanical” (212). The patient of Beckett’s *Ping* is a paradigm case.

Notes

¹ The version I have used comprises all ten drafts of *Bing / Ping*, nine in French, the final French version, and Beckett’s own English translation. As the final version covers barely two pages, I shall not refer to page numbers when quoting from it.

² See ‘ping, v.², 1. a. quot. 1930’; also ‘ping, *sb.*, a.’ *OED*, 2nd edn., 1989: ‘An abrupt ringing sound, such as that made by a rifle bullet in flying through the air, by a mosquito, the ringing of an electric bell, etc.’

³ ‘ping, *sb.*, b.’ *OED*, 2nd edn., 1989: ‘A very short pulse of high pitched, usu. ultrasonic, sound such as is emitted by sonar; also, a pulse of audible sound by which this is represented to a user of such equipment’.

⁴ For the full events leading up to the writing of *Ping*, see Knowlson, 530-42.

⁵ Knowlson is quoting from a letter sent by Beckett to Jocelyn Herbert on 18th August 1966: the day of *Ping*’s completion.

⁶ ‘murmur, *sb.*, 1. a., b.’ *OED*, 2nd edn., 1989: ‘Subdued continuous or continuously repeated sound; an instance of this’, ‘A sound of this kind (whether normal or morbid) heard in auscultation’.

⁷ ECG monitors have been available commercially since 1911, but their portable form was first introduced in the 1960s.

⁸ ‘trace, *sb.*, I. 8. b., a.’ *OED*, 2nd edn., 1989: ‘The luminous line or pattern on the screen of a cathode-ray tube’, ‘[...] the traced record of a self-recording instrument [...]’.

⁹ All the key words – “Ping,” which occurs 34 times in the text; “trace” (ten occurrences); “murmur” (nine occurrences) – carry a connotation of vestigiality; they indicate that which was but is no longer. On the other hand, the hypothesized

ECG machine would be a constant presence – and the only sentence repeated in its entirety is “Ping elsewhere always there but that known not.”

¹⁰ ‘BING, interj. – 1865; onomat.’ Le nouveau Petit Robert, 2007: ‘Onomatopée évoquant un bruit sec (souvent métallique) résultant d’un choc ou d’un heurt’

¹¹ ‘HOP, interj. – 1828; onomat.’ Le nouveau Petit Robert, 2007: ‘Interjection servant à stimuler, à faire sauter’

¹² ‘1. PAF, interj. – 1718; onomat.’ Le nouveau Petit Robert, 2007: ‘Interjection qui exprime un bruit de chute, de coup.’ (such as for example in the mimetic, if not directly onomatopoeic expression *Pif, paf!*)

¹³ Yoshiki Tajiri has written on how “Beckett’s synaesthesia coexist[s] with the separation of the senses induced by technology” in other works, particularly *Not I*, *Texts for Nothing*, *What Where* and *The Unnamable*. See Yoshiki Tajiri, ‘Beckett and Synaesthesia’, in *SBT/A* 11, “Samuel Beckett: Endlessness in the Year 2000/Fin Sans Fin En l’An 2000,” eds. Angela Moorjani and Carola Veit (Amsterdam: Rodopi, 2001), 178-85.

¹⁴ The double bind, Gregory Bateson’s aetiological theory of schizophrenia, is uniquely well-suited to describe the situation depicted in *Ping*, as it was in fact inspired by a conversation between Bateson and Norbert Wiener, the author of *Cybernetics*, about the possibility of paradoxes and *idées fixes* emerging in computers. For the origins of the concept, see Steve Heims, *Constructing a Social Science for Postwar America: The Cybernetics Group, 1946 - 1953* (Cambridge, MA and London: MIT P, 1991), 156-7; for the first formulation of the double bind, see Gregory Bateson, Don D. Jackson, Jay Haley and John H. Weakland, ‘Towards a Theory of Schizophrenia’ in Gregory Bateson, *Steps to an Ecology of Mind: Collected Essays in Anthropology, Psychiatry, Evolution and Epistemology* (St Albans: Paladin, 1973), 173-198 (first publ. in *Behavioural Science*, 1 (1956), 251-64).

Works Cited

Amiran, Eyal, *Wandering and Home: Beckett’s Metaphysical Narrative* (Pennsylvania: Penn. State UP, 1993).

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- Beckett, Samuel, 'Ping', in 'Appendix II: Variants in the Works of Samuel Beckett, with Special Reference to *Bing*', Raymond Federman and John Fletcher, *Samuel Beckett: His Works and His Critics. An Essay in Bibliography* (Berkeley: U of California P, 1970), 325-43 (341-3).
- Bair, Deirdre, *Samuel Beckett: A Biography* (New York and London: Harvest, 1978).
- Bosseur, Jean-Yves, 'Between Word and Silence: *Bing*', trans. Mary Bryden, in *Samuel Beckett and Music*, ed. Mary Bryden (Oxford: Clarendon, 1998), 241-7.
- Brienza, Susan, *Samuel Beckett's New Worlds: Style in Metafiction* (Norman and London: U of Oklahoma P, 1987).
- Bryden, Mary, 'Deleuze Reading Beckett', in *Beckett and Philosophy*, ed., Richard Lane (Basingstoke and New York: Palgrave, 2002), 80-92.
- Dearlove, J. E., "'Last Images": Samuel Beckett's Residual Fiction', *JML* 6.1 (1977), 104-26.
- Deleuze, Gilles, 'The Exhausted', in Gilles Deleuze, *Essays Critical and Clinical*, trans. Daniel W. Smith and Michael A. Greco (Minneapolis: U of Minnesota P, 1997), 152 - 74.
- Dick, Philip K., 'Man, Android and Machine', in *The Shifting Realities of Philip K. Dick: Selected Literary and Philosophical Writings*, ed. Lawrence Sutin (New York: Vintage, 1995), 211-32.
- Gass, William H., 'Philosophy and the Form of Fiction', in William H. Gass, *Fiction and the Figures of Life* (New York: Vintage, 1972), 3-26.
- Hill, Leslie, *Beckett's Fiction in Different Words* (Cambridge: Cambridge UP, 1990)
- Hubert, Renée Riese, 'A la trace de <<Bing>>', in *Samuel Beckett*, eds. Tom Bishop and Raymond Federman (Paris: l'Herne, 1976; repr. 1997), 253-8.
- Kenner, Hugh, *A Reader's Guide to Samuel Beckett* (London: Thames, 1973).
- Knowlson, James, *Damned to Fame: The Life of Samuel Beckett* (London: Bloomsbury, 1996).
- Locatelli, Carla, *Unwording the World: Samuel Beckett's Prose Works After the Nobel Prize* (Philadelphia: U of Pennsylvania P, 1990).
- Lodge, David, 'Some 'Ping' Understood', in *Encounter* 30.2 (1968), 85-9; repr. in *Samuel Beckett: The Critical Heritage*, eds. Lawrence Graver and Raymond Federman (London: Routledge, 1979), 291-301.
- Segrè, Elisabeth Bregman, 'Style and Structure in Beckett's "Ping": *That Something Itself*', *JML* 6.1 (1977), 127-47.