

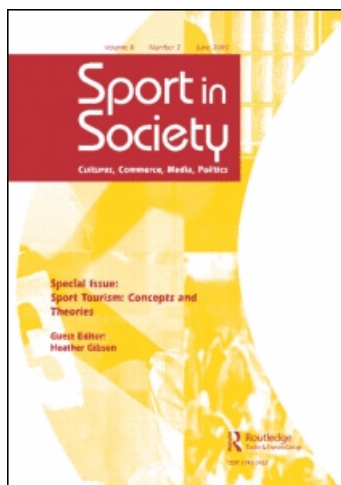
This article was downloaded by: [Griffith University Library]

On: 7 August 2009

Access details: Access Details: [subscription number 773444546]

Publisher Routledge

Informa Ltd Registered in England and Wales Registered Number: 1072954 Registered office: Mortimer House, 37-41 Mortimer Street, London W1T 3JH, UK



Sport in Society

Publication details, including instructions for authors and subscription information:

<http://www.informaworld.com/smpp/title~content=t713634841>

Surfing: The cultural and technological determinants of a dance

Douglas Booth ^a

^a University of Otago,

Online Publication Date: 01 March 1999

To cite this Article Booth, Douglas(1999)'Surfing: The cultural and technological determinants of a dance',Sport in Society,2:1,36 — 55

To link to this Article: DOI: 10.1080/14610989908721828

URL: <http://dx.doi.org/10.1080/14610989908721828>

PLEASE SCROLL DOWN FOR ARTICLE

Full terms and conditions of use: <http://www.informaworld.com/terms-and-conditions-of-access.pdf>

This article may be used for research, teaching and private study purposes. Any substantial or systematic reproduction, re-distribution, re-selling, loan or sub-licensing, systematic supply or distribution in any form to anyone is expressly forbidden.

The publisher does not give any warranty express or implied or make any representation that the contents will be complete or accurate or up to date. The accuracy of any instructions, formulae and drug doses should be independently verified with primary sources. The publisher shall not be liable for any loss, actions, claims, proceedings, demand or costs or damages whatsoever or howsoever caused arising directly or indirectly in connection with or arising out of the use of this material.

Surfing: The Cultural and Technological Determinants of a Dance

DOUGLAS BOOTH

Progress will come from exploring new areas on the wave face and by designing new equipment which alters the surfer's approach to the wave.

Nat Young¹

Surfboards emulate the philosophy of the times.

Mickey Muñoz²

According to orthodox surfing history, advances in technology, in particular the use of lightweight fibreglass and polyurethane from the late 1950s, made surfboards more manoeuvrable and changed the way surfers rode waves. Lightweight boards also made surfing more accessible to enthusiasts who no longer had to lug heavy and cumbersome equipment to the water's edge. In addition, another advance in technology, the mass produced car, gave surfers the means to search for perfect waves. And it was while they were searching for waves that surfers created a unique subculture.³ While historians must take cognizance of board technology and improvements in transport when considering the development of surfing, traditionally they have tended to ignore cultural factors.

Surfing is the act of standing upright on a board and guiding it across the face of a breaking wave. Most wave riders, however, whether they surf for recreation, sport or profession, conceptualize themselves as 'danc[ing] to and with a natural energy form'.⁴ Pierce Flynn defines dancing as 'an organic unity between man and nature that is mediated by cultural processes'.⁵ When applied to surfing, this definition enables the historian to recover those cultural factors which influenced its development. Factors such as beliefs about the relationship between humankind and nature, and the values attached to graceful human movement, determine surfers' interpretations of waves and how they finally translate those interpretations into movement.

This article traces the history of surfboard technologies and their respective influences on riding styles. It then analyses how different beach cultures in Hawaii, California and Australia mediated surfers' interpretations of waves and contributed to distinct surfing dances.

Olo and Alaia Surfboards, Redwood Planks, Plywood Longboards, Balsawood Malibus, Polyurethane Shortboards: A History of Surfboard Technologies

Only five basic surfboard technologies, or relationships between design and materials, have existed since premodern times: solid olo and alaia surfboards, solid redwood planks, hollow plywood longboards, balsawood and fibreglass malibus, and polyurethane shortboards.

Hawaii was the centre of surfboard technology in premodern Oceania. Board-makers there produced two models. Olo surfboards, used exclusively by chiefs, were between 14½ and 18 feet long, 16 and 24 inches wide, and 5 and 8 inches thick.⁶ Chiefs also joined ordinary Hawaiians on shorter, broader and thinner alaia boards. These were between 7 and 12 feet long, 13 and 20 inches wide, and ½ and 1½ inches thick. Both models were essentially straight planks having no camber (rocker) through their length, although the top and bottom decks were mildly convex tapering to rounded rails. Nor did the boards have fins. Most were made from the wood of wiliwili, koa or breadfruit trees. Board-makers shaped the basic design with stone and bone adzes and then smoothed the surfaces with granulated coral and 'oahi stone. They stained the boards with juices from the roots of ti plants, kukui bark, kukui nuts or banana buds. Finally, they sealed the boards with kukui nut oil.⁷

Surfing declined in the mid-nineteenth century with the arrival of American missionaries in Hawaii and was only revived there early this century. Modern surfing quickly diffused from Hawaii to the Pacific rim. Instrumental in this process were two Hawaiians, George Freeth and Duke Kahanamoku. The Los Angeles-based Pacific Electric Railway employed Freeth as a professional surfer-entertainer to promote its Los Angeles-Redondo Beach spur line. Later he worked as a professional lifeguard.⁸ After winning the 100 metre freestyle swim at the 1912 Olympic Games in Stockholm, Kahanamoku received invitations to give swimming and surfing demonstrations on the east and west coasts of the United States and in Australia and New Zealand. Kahanamoku visited Sydney in the summer of 1914/15 and gave two surfing demonstrations. (Charles Paterson, president of the Surf Bathing Association of New South Wales, later the Surf Life Saving Association of Australia, imported an Hawaiian alaia surfboard in 1912, but local bathers failed to master the equipment.)⁹ Timber merchant George Hudson donated a piece of roughly-shaped sugar pine for Kahanamoku's demonstrations; Kahanamoku personally finished the board using an adze and a plane. His board was 9 feet long, 24 inches wide, and 3 inches thick; it weighed 65 pounds.¹⁰ At this time, redwood was the preferred material of construction and the standard solid 10 feet long

redwood plank weighed between 100 and 125 pounds.

Like their premodern counterparts, early twentieth century board-makers shaped by feel and intuition. Describing how he built his favourite redwood board, which he used for more than 20 years, Kahanamoku explained that:

I would just feel it and say, need a little off here, that's pretty good, little bit here, and so on, until it was like I wanted it. Then I'd try it in the water after putting two coats of shellac on it. Finally, it was just right. I took it out and caught a wave. I could feel it through my feet. I said, oops, this is it Duke. Don't mess with it anymore.¹¹

With the revival of surfing, board-makers immediately began testing new materials and designs in the search for lighter, faster, more manoeuvrable boards. In Australia, Claude West¹² experimented with 'hollow' designs as early as 1918. He chipped a depression in the top of his solid redwood plank and screwed a new deck over the cavity. But without plywoods and waterproof glues 'the experiment was not a success'.¹³ Alf 'Weary' Lee, another enthusiast who had watched Kahanamoku surfing during his Australian visit, also experimented with hollow boards. One of his models was wooden ribbed and covered in canvas. But it was still too 'heavy and unresponsive'.¹⁴ American Tom Blake¹⁵ perfected the hollow board design. His first hollow board was, in his own words, an 'accidental invention'. After building a replica of an ancient olo, Blake 'drilled it full of holes to lighten and dry it out'. He then simply 'plugged' the holes.¹⁶ In 1930, Blake acquired a patent for his hollow boards which weighed between 75 and 100 pounds.¹⁷

But Blake's primary objective was not to produce a more manoeuvrable surfboard. He sought a faster paddling board, 'one more suitable for competition in the annual surfboard paddling races held each summer in Southern California'.¹⁸ The development of plywood and waterproof glues assisted Blake's experiments with the hollow boards and he began making box-framed boards covered with plywood. Faster paddling boards remained the objective and so Blake shaved the width and increased the length to 16 feet and longer. His plywood longboards, popularly known as 'cigars', 'pencils' or 'toothpicks', weighed only 60 pounds. Blake's boards became the standard surfing equipment; Frank Adler introduced them to Australia in the mid-1930s. From a wave rider's perspective, longboards were no more manoeuvrable than solid redwood planks.

In the 1930s, surfers began to examine the tails of their boards. Standard redwood planks had flat tails between 12 and 14 inches wide. Turning was extremely difficult and the boards continually 'slipped' out of the wave, throwing their riders. In Hawaii, a new generation of surfers, including

Wally Froiseth, John Kelly and Fran Heath, began to shape the tails. They introduced pintails, about 4 inches wide, and then v-shaped bottoms over the back quarter of the board. A v-bottom kept one rail of the board in the water and allowed the surfer to change direction more easily. V-bottomed boards, Froiseth said, meant that a surfer could 'change direction by leaning back':

We weren't dragging our feet too much anymore. We used to have to turn [redwood planks] by dragging our feet in the water, but now you could turn by tipping [the board. Previously] ... you had to get your weight back and then lift up the bow, and slowly turn around in the other direction, then step forward into trim. You had to get way back on the board with all your weight because those redwood boards were all heavy, like 90 pounds.¹⁹

But it was Tom Blake who provided the solution: in 1935 he added a fixed fin to the bottom of the tail.

The late 1930s were a period of innovation and experimentation. As Young puts it, 'every conceivable design concept was tried, including multi-fins, hollow boards, short boards, concaves, low rails, almost everything you could possibly think of'.²⁰ Bob Simmons, Matt Kivlin and Joe Quigg from California were the undisputed kings of surfboard technology. A student at the California Institute of Technology, Simmons took up surfing to exercise an arm which he badly injured in a motorcycle accident. Soon he was a dedicated surfer and boardmaker. During the war, Simmons worked for Douglas Aircraft where he became familiar with fibreglass. As a lightweight, waterproof substitute for plywood, fibreglass cloth soaked in resin and then hardened would revolutionize surfboard technology in the 1950s. But Simmons delayed using fibreglass because he mistakenly believed that heavy boards travelled faster. It was not the first, nor the last time that a boardmaker rejected a material or design which would later become standard. Wally Froiseth, for example, continued to ride pintail redwood boards even after the introduction of lightweight balsawood. The latter, Froiseth complained, 'floated too high'.²¹

After the war Simmons made 'sandwich boards': a layer of styrofoam between plywood and covered in fibreglass. Later, he added soft, easily shaped balsawood rails to his 'sandwiches'.²² Simmons opened a surf shop in Santa Monica and became the main board supplier in California. He glued the plywood, styrofoam and balsawood together, and Kivlin and Quigg shaped the rails and glassed the boards.²³

A handful of board-makers had been using lightweight balsawood since the early 1930s. But balsawood only replaced redwood in the late 1940s after board-makers cleared a technological hurdle. Balsawood is porous and

requires complete sealing before immersion in water. Fibreglass was the obvious sealant but the early resins required suncuring and this process left many boards uneven and unattractive to surfers. Although chemists produced catalysts to harden fibreglass resin in the early 1940s, the formula remained a closely guarded secret until after the war.²⁴

The adoption of balsawood led to a radical reshaping of surfboards. The key actors were a group of California surfers, including Quigg, Kivlin, Dale Velzy, Hap Jacobs, Dewey Weber, Rennie Yater, Greg Noll, Dave Sweet and Hobart 'Hobie' Alter. Their boards were between 9 and 11 feet long and 22 inches wide, with shaped (either square or round) tails, and covered with two layers of 10 ounce fibreglass cloth. These new malibu boards weighed around 20 pounds and they were the first purely functional wave-riding craft. In 1957, Scott Dillon, Gordon Woods, Bill Wallace and Barry Bennett began producing malibu boards in Australia.

A shortage of balsawood in the second half of the 1950s forced board-makers to search for an alternative. Sweet and Alter had been experimenting with different foam compounds for years, but it was Gordon 'Grubby' Clarke, a surfer and chemistry graduate, who 'refined the balance of chemicals to be poured in to the mould'. He would go on to become 'the world's largest supplier of foam blanks'.²⁵ Meanwhile, the American Latex Company began producing durable polyurethane foam blanks for a variety of commercial uses and by 1959 the easily sculptured polyurethane had replaced balsawood in the surfboard industry.

Malibus dominated board technology for over a decade. Shortboards did not replace them until the late 1960s. Australian boardmaker Bob McTavish, a 'student' of Scott Dillon, pinpoints 1967 as the year in which 'three quarters of the development of the short board' occurred.²⁶ McTavish pioneered the shift, although he attributes the theoretical and technical insights to George Greenough from California. Similarly, Young describes Greenough as the 'guru of the short board era'.²⁷ A fisherman and kneeboard rider, Greenough visited Australia for the first time in 1966. McTavish says that 'the first wave I saw Greenough ride' evoked my ultimate 'vision' of surfing:

Fast drop, slam into a bottom turn, then project out and under the lip. Carve off the top, drive back down the face, repeat. That's it! ... from that day on I had a mental picture of a guy standing on a short board, doing swooping turns and pushing into the lip with increasing fierceness as he worked down the line – sort of slippery and unencumbered.²⁸

By the middle of 1967, McTavish's boards were under 8 feet long with generous nose lift, constant tail rocker, deep v-bottoms, fine, thin, almost

square rails, and flexible fins set up to 12 inches from the rear. He also replaced 10 ounce cloth with 6 ounce cloth.²⁹

McTavish's boards attracted the label 'fantastic plastic machines' and their role in the history of surfing has been subject to endless debate. The plastic machines allowed surfers to manoeuvre under the lip of a breaking wave and position themselves vertically on the face of the wave. Aesthetically, however, they were 'the most disgusting surfboards imaginable' with their 'wide noses, wide middles, wide tails'.³⁰ But of more significance, they didn't work in steep powerful Hawaiian waves.³¹

While surfing folklore attributes the high manoeuvrability of the plastic machines to their radical v-bottoms, the improvements actually derived from the Greenough-inspired flexible 'narrow-based swept back fin', a design he originally 'copied' from the tail of a blue fin tuna.³² As Dave Parmenter points out, 'until the advent of the Greenough high-aspect ratio fin, boards could only be steered, instead of driven. The reason the boards of the Fifties and early-Sixties were so clumsy wasn't so much that they were crude or heavy, but more that they had shitty fins'.³³

Although the plastic machines required 'horrible contortions' to make them work, they nonetheless spread, 'like a virus', across Australian beaches in the summer of 1967/68.³⁴ McTavish spent that summer in the northern hemisphere and by December 1967 had 'finished' with the deep v-bottom. In January 1968, while staying with Greenough in California, McTavish finally shaped his 'vision': 8 feet long, 20½ inches wide, 14 inch nose, 13 inch tail, 2¼ inches thick, 5 inch square tail, gently pointed nose, a soft rocker through the entire length of the board, 10 inch fin, low and rounded rails with more edge in the tail, flat bottom.³⁵ After a long gestation, delayed by the plastic machine, a fully functional shortboard had arrived.

During 1968 and 1969, board-makers produced increasingly shorter craft. Boards under 6 feet with full noses and full, rounded, tails became the vogue. Although they performed 'beautifully powering around the curl, driving off their large single fin', the design 'failed miserably when a wave broke ahead of them or the surfer needed to follow through and coast over long flat sections of the wave'.³⁶ As a result, board-makers increased the length to between 6 feet 6 inches and 7 feet. Simultaneously, Gerry Lopez from Hawaii introduced the 'tucked edge' – instead of putting the edge on the perimeter of the board, he shifted it under the rail.³⁷

In California, Mike Eaton, head shaper with Bing Copeland applied the twin fin concept to short boards. Twin fins allowed riders to gain more distance from a turn. Reigning American champion Corky Carroll and Hobie Alter took up the boards and aggressively marketed them.³⁸ Santa Cruz shaper and surfer Tom Hoyo introduced twin fins to Australia, shaping his versions at Barry Bennett's factory. Hoyo's twin fins had thick, wide

round, diamond or square tails which only worked in small waves 'where they could be surfed flat in the water'. Parallel fin placement was the major problem with this technology: it made the boards 'stick rather than roll off the face [of the wave] and hold track down the line when it was time to change direction'.³⁹

California surfer David Nuuhiwa and Huntington Beach shapers Terry Martin and Steve Brom adapted Hoyer's design and produced twins with thicker, harder edges and a 'toed-in, tipped-out fin set up'. The new design surfaced in Hawaii where surfer Reno Abellira made further modifications. Jack McCoy manufactured Abellira's model in Australia and introduced it to Mark Richards. Although they didn't work in big Hawaiian waves, Richards complained that single-finned boards restricted his radical manoeuvres and so he decided to persevere with twin-finned boards. With advice from respected Hawaiian shaper Dick Brewer, Richards improved the twin fin design and went on to win four world championships.⁴⁰

While twin fins were exceptionally easy to turn, they remained too 'loose'; even Richards' twin fins could not handle waves over 8 feet. In an attempt to give surfers more control when turning, yet retain the manoeuvrability of twin fins, surfers experimented with three fins. Historians of surfing credit Australian Simon Anderson with introducing three-finned boards. He called his three-finned boards 'thrusters': 'the constant squirt action of the water flowing between the fins, coupled with the increased planing area of the tail gave the boards instant acceleration'.⁴¹

Polyurethane shortboards with three fins are now standard surfboard technology. McTavish believes that at last 'there's right and finally wrong' in surfboard design. Indeed, the only change over the last decade and a half has been the fine tuning of shape. Eye and feel have also vanished from the shaper's craft. McTavish predicts that surfboards are heading towards 'stock shapes' and that manufacturers will soon produce moulded boards.⁴² Yet, short three-finned boards do have design faults: they require constant movement, or changes of direction, to produce acceleration and to prevent stalling. Once an integral part of the surfer's dancing repertoire, modern boards do not allow standing and cruising.

Redwood Statues, Longboard Stylists, Malibu Hot Doggers, Three-finned Gymnasts: Board Technology and Dancing Style

Board technology has clearly influenced surfers' dancing styles. Whereas plank and longboard technology imposed severe limitations on surfers' movements, three-fin technology has freed the surfer: today's boards are 'extensions' of the surfer's body and mind.

Few riders of plank ever mastered the art of turning and most simply

danced in broken waves (white water) while travelling 'dead ahead'. Gently rolling waves allowed riders to angle their boards and travel across the face of the wave, but without fins and shaped rails 'sliding ass' was a constant hazard. Surfers wanting to change direction either dragged one foot in the water like a rudder or stepped to the back of the board and 'tilt-danced' it from one track to another.⁴³ Plank technology fostered a rigid, statue-like style where surfers demonstrated their superior balance with minimum body movement. Even surfers' 'tricks' – headstands, coming in backwards, stepping from one board to another, riding in tandem – emphasized balance rather than graceful movement.

Fins allowed surfers to track along the wall and change direction by leaning and shifting their weight, and by bending their knees and pushing. Graceful poses – bent knees, arched backs, outstretched arms coincided with finned longboards during the interwar years. However, the coexistence of different equipment – finned and unfinned boards, and solid and hollow planks – contributed to a hotchpotch of styles and ensured that no one style gained currency.

Malibus made surfing easy and simple to learn. Greg Noll took up surfing as an 11-year-old in 1948 and recalls spending 'my entire first summer trying to catch a wave'. By contrast, his children were standing on malibus 'within a half-dozen waves'.⁴⁴ The malibu was the first highly manoeuvrable surfboard. It ushered in 'hot dog' dancing: maximum turns, climbing and dropping the board along the wall of the wave, stalling, walking to the nose of the board, dipping the head into the wall of the wave. Hot doggers displayed grace and élan.

While polyurethane and fibreglass are still the principal materials used in surfboard construction, today's craft are significantly faster and more manoeuvrable than the first generation of shortboards. Modern surfboards are 'extensions of the body and mind, responsive to the slightest thought and movement of the rider, allowing unprecedented freedom of movement on and with the wave'.⁴⁵ Contemporary surfing is a form of gymnastic dance: the wave is an apparatus on which riders perform every imaginable manoeuvre. The repertoire includes tailslides (withdrawing the fins from the wave and allowing the board to slip down the face of the wave), floaters ('floating' the boards along the top of a breaking wave), reverses (rapid changes of direction), 360s (turning the board through 360 degrees on the face of the wave) and airs (flying above the face of the wave). There is no doubt, however, that modern boards have also contributed to the steady decline in the number of young people taking up surfing. Parmenter calls modern boards 'absurd' and 'fantastic spastic machines'. Covered by just one 4 ounce layer of fibreglass cloth and often weighing under 6 pounds, today's boards offer surfers little buoyancy or stability when paddling and

catching waves. Parmenter likens them to fashion models: 'they're sexy and curvy, and you look good with your arm around one on the beach. But they are neurotic, anorexic and will disappoint you down-the-line'.⁴⁶

Culture and Surfing Style

Technology has influenced surf-riding style and, especially after the Second World War, contributed greatly to the popularization of surfing. Indeed, many surfers from that era argue that technology has 'driven' surfing. Cliff Tucker from California, who won the 1940 Pacific Coast Surf-Riding Championship, offers an example of this view:

It's absolutely amazing what's being done on a surfboard these days. I'm sure we were just as strong and capable then as athletes, but we just didn't have the technology that's evolved in surfing since then.⁴⁷

Early Australian surfing legend Justin 'Snow' McAlister agreed, although he insisted that cheap, mass-produced cars also contributed to surfing's rapid growth. The popularity of surfing, claimed McAlister, necessitated a shift in social values and that change came with the motor vehicle: 'cars were becoming available and in 1948 petrol rationing was lifted (during the war we had been limited to four gallons a month) giving a new freedom to youth. Suddenly the youth were able to get mobile'.⁴⁸ But neither surfboard nor automobile technology explain how surfers interpret waves.

Deep in each surfer's subconscious is an interpretation of an ocean wave. When surfers dance with waves they translate their interpretations into movement.⁴⁹ While it is true that early technology severely restricted, and in a sense determined, surfers' movements, the physics of planks and longboards prohibited airs, for example, the initial interpretation of the wave is a cultural process free from technological limitations. Of course, one could argue that there is an interrelationship between technology and culture and that board technology has influenced surfing in the same way that radio and television helped change late twentieth century leisure patterns. It is a plausible argument but one which quickly loses its persuasive power in the light of a comparative cultural analysis of Hawaiian, Australian and Californian beaches.

With the arrival in the Islands of missionaries from New England, premodern Hawaiian surfboard technology declined. Early European explorers and travellers praised Hawaiian surfing skills. Puritanical American missionaries took a different view: they considered surfing an 'evil and immoral activity', allowing as it did the unrestrained intermingling of the sexes. They banned surfing and by the end of the nineteenth century only a few dozen Hawaiians rode waves:⁵⁰ neither 'advanced' technology

nor athletic skill saved surfing from the religious zeal of Christian missionaries. Young *haole* (non-indigenous) Hawaiians revived surfing at the beginning of this century. The revival coincided with a new culture of pleasure which swept the entire Western world and helped legitimize surfing as a healthy, thrilling and acceptable hedonistic pastime.

Waikiki, Hawaii, was the undisputed beach capital of this new culture of pleasure. Waikiki beach was the archetypal hedonistic paradise with grass skirts, flower necklaces, hula dancing and surfing. At Waikiki, indigenous Hawaiian beach boys and beach girls forged and maintained a relaxed and casual culture. Australians also experienced the culture of pleasure. Indeed, it contributed to the lifting of a 60-year ban on public bathing in daylight hours. In Australia, however, nineteenth century morality remained potent. Charles Paterson, president of the Australian Surf Life Saving Association (SLSA), provides an excellent example here with his derisive comments about Waikiki which he visited in 1927:

Hawaiian beach boys spend their whole time on the beach, giving exhibitions on the board or taking out bathers on board or outrigger ... Many visiting women make fools of themselves over these lazy boys. They are utterly spoiled. The beach is a riot of colour in costumes, dressing gowns and coolie coats. There are no restrictions as to costume. People wear what they like. Some roll them down to the waist (men and girls both) and revel in the sun. Nothing is done in the way of teaching life saving, nor are there any life saving appliances.⁵¹

Surfing thus developed in Hawaii under few moral constraints, especially with respect to the display of the body in public; in Australia it developed within the ambit of the SLSA, a unique institution which attempted to mediate the contradiction between nineteenth century morality and twentieth century hedonism.

The SLSA has had a profound influence on Australian beach culture. It has imbued in many Australians a peculiar philosophy which says that human willpower and hard labour can overcome and subordinate the forces of the ocean. This philosophy appears in books about the Association which bear titles such as *Heroes of the Surf*, *Gladiators of the Surf*, *Surf: Australians Against the Sea* and *Vigilant and Victorious*.⁵² It also appears in the array of military and paramilitary organizations which the SLSA traditionally invites to its national championships. The rationale of this philosophy becomes clearer when one examines the history of the SLSA.⁵³

The foundation members of the SLSA were middle class surfbathers who pursued health and hedonism at the beach. They formed surf-bathing, later life saving, clubs which had three objectives: to provide beaches with changing and social amenities, to legitimize public hedonism at a time when

moralists frowned upon sea-bathing, and to patrol local beaches and provide a safety and rescue service for other middle class beachgoers. Surf-bathers quickly discovered the value of sport in fulfilling these objectives. Sports, such as beach sprinting, ocean swimming, surfcraft races and precision marching, not only kept members fit for duty, they 'proved' that they were highly disciplined athletes who would help preserve high moral standards at the beach. Within a decade of the SLSA's formation, sport had become the *raison d'être* for most life-savers. (The SLSA held its first 'championship' carnival in March 1915, shortly after Kahanamoku gave his surfing demonstrations.) Sport infused in members a fierce, aggressive confidence in their abilities to conquer even the most tumultuous seas. And it also subdued the hedonistic component of the early surf-bathing culture.

How did these different beach cultures affect surfboard technology? In Hawaii, and California, board-makers experimented with designs to improve the paddling speed *and* wave-riding potential of their craft. Paddling was a sport and a critical aspect of the board rescue method used by professional lifeguards in Hawaii and California. In Australia, however, the SLSA opposed members using surfboards even as rescue craft. McAlister and Brawley argue that tradition bound administrators within the Association wanted 'to protect the distinct nature of Australian surf life saving' from American hegemony and thus favoured local rescue methods and equipment such as the reel-and-belt and the surfboat.⁵⁴ The SLSA's ready adoption of wave-riding skis, a uniquely Australian invention in the 1930s, adds further weight to McAlister and Brawley's claim. Unable to master the art of standing upright on a surfboard, G.A. 'Saxon' Crackenthorp designed a craft with a lower centre of gravity. Crackenthorp's surfskis were about 8 feet long and 28 inches wide; they had a wide beam, turned-up nose and a hollow deck about 6 inches deep. Riders sat on their skis and used a paddle to drive and steer.⁵⁵

Some Australian seaside councils also opposed surfboards which they said posed a hazard to their riders and the surfbathing public. Fearful beachgoers initiated several 'ban-the-boards' campaigns and some councillors voted to remove menacing boards from bathing areas.⁵⁶ Ordinary life-savers resisted, insisting that in certain rescue situations surfboards were advantageous. Through their clubs they approached the Association to recognize officially boards as rescue equipment. Instrumental in convincing Sydney's Manly council to reconsider its proposed ban was Duke Kahanamoku's pupil and life-saver Claude West. Coincidentally, on the very day that they went to the beach to study the board problem, several Manly councillors observed West use his surfboard to rescue three people swept off rocks into the sea. West penetrated a heavy shorebreak which had prevented beltmen and a surfboat crew from reaching

the drowning victims. Once 'regarded as instruments of potential destruction', Manly councillors now 'hailed' surfboards as 'the answer to a patient's prayer'.⁵⁷ In the early 1930s, the SLSA finally relented and acknowledged the worth of surfboards as rescue apparatus; at the 1933 Australian championships life-savers competed in the surfboard rescue event for the first time.⁵⁸ Not surprisingly then, under the influence of the SLSA, Australian surfers tended to experiment with designs that 'improved paddling speed' and paid scant attention to dancing performance.⁵⁹

Cultural obstacles to the refinement of surfboard design also existed in Hawaii and California. Many older surfers, for example, regarded the early balsawood boards as beginners' or girls' boards. Experienced surfers 'wouldn't be seen on a light board', says Joe Quigg, 'and when a kid or girl would paddle out on one, they'd chase them away and make them surf on the smaller inside waves'. These attitudes changed only after Matt Kivlin and Leslie Williams, then the two best surfers in California, started riding balsawood boards and 'doing things nobody had ever seen before'. 'When other surfers saw what Matt and Leslie were doing', Quigg recalls, 'it was the beginning of the end for old-fashioned and crude surfing. After that, no hot surfer ever built an old redwood or paddleboard again. And surfing left its "crude" period.'⁶⁰ The difference between Hawaii and California, on the one hand, and Australia, on the other, was the institutionalized character of these cultural obstacles in the latter. Many Hawaiian and Californian surfers worked as professional lifeguards and surfed for pleasure during their free time; most Australian surfers belonged to life saving clubs and donated their leisure time to patrolling beaches and training for life saving competitions. Few had time, or the inclination, to surf for pleasure. Moreover, while small numbers of women surfed, the SLSA prohibited them from joining the clubs, performing rescues or competing.

Surfboard riding contests, as distinct from paddleboard competitions, rapidly spread. In 1954, the Waikiki Surf Club organized the first international surfing championships at Makaha. Judges awarded points for length of ride, number of waves caught, skill, sportsmanship, and grace on the board. The Makaha championships founded a new sport. But developments in California would change surfing's sporting direction: California was not only the centre of postwar technical developments, it also spawned a new surfing subculture.

Heavy and cumbersome boards, limited transport, and in Australia a more formal club environment, tended to confine Hawaiian and Australian surfers to their local beaches. On the other hand, more affluent Californian surfers travelled for waves. Cheap air fares in the late 1940s allowed many Californians to return to Hawaii where they had observed idyllic surf during wartime postings. The 'surfari' became synonymous with escapism. The

'surfari' and the warm aloha of Hawaii, which Californian surfers took back to the mainland, became the foundations of a new subculture. Surfers adopted their own language, humour, rituals and dress which increasingly assumed an antisocial character.⁶¹ The brown eye – exposing the anus to public view from a passing vehicle – was one popular antisocial expression among surfers. A new surfing subculture flourished in California in the late 1950s and spread internationally through films and magazines. But surfers' behaviour fuelled a backlash: surfer became a dirty word. Newspaper editorials in the United States, Australia, New Zealand and South Africa condemned surfers. Some councils closed beaches; others banned surfboards.

Ironically, social antagonism provided surfers with the motivation to organize. Around the world they formed national associations and, in 1964, surfers formed an international federation. Like the first generation of Australian surf-bathers, surfboard riders recognized that organized competition was the perfect strategy to gain public acceptance. However, the codification of surfing was no simple matter: surfing dances reflected cultural variations.

Indigenous Hawaiians based their style on flowing in perfect rhythm with the breaking wave. Underlying this dance was a casual and relaxed Polynesian philosophy which, in the words of legendary Hawaii surfer Gerry Lopez, says 'it's easier to ride the horse in the direction that it's going'.⁶² Bill Hamilton embodied this 'unobtrusive' style: 'Ever wonder what happened to Billy Hamilton', Lopez once asked. Well, 'he got *so* smooth in the water that sometimes a wave would go by and spectators wouldn't even register that it was being ridden, let alone by whom'.⁶³ Hamilton himself explained his approach and style as follows:

After about six years of concentrated effort, perfecting turns, cutbacks, noserides, etc., I became aware of the total correlation of man, surfboard and wave. This discovery had a profound effect on my surfing, and sent me one step further into a new dimension – the flow ... I would surf with my mind open, reacting to the situation as it appeared, and utilizing whatever manoeuvre it took to get to the next experience.⁶⁴

Hawaiian style thus emphasized 'the wave and the performer as a co-ordinated unit; the surfer dances *with* the wave, letting it lead him along its natural direction'.⁶⁵

In the early 1960s, Californians attempted to transform Hawaiian style into what Parmenter calls 'an original American dance ... a delightful mixture of ancient Polynesian sport, bullfighting, skiing and sailing'. Bullfighting? According to Parmenter, Ernest Hemingway 'bought

bullfighting into popularity in the Forties, and quite a bit of the toreador and his 'grace under pressure' ethic was later absorbed into surfing: the Manolte arches, the clipped but elegant body english when duelling with the curl, and the graceful foot-peddalling up to the nose to taunt the wave'. Skiing? The telemark, in particular, influenced carving turns. Sailing? 'Longboarding a perfect point wave', Parmenter suggests, 'is a lot like sailing really; you trim through a fast section, cutback or "come about" when it slows down, and then set up trim again on a new "tack" as the wave lines up again.'⁶⁶ Thus, unlike Hawaiians who flowed with waves under nature's guidance, Californians sought 'to enhance the beauty of a breaking wave'.⁶⁷ By contrast, Australian, and South African, surfers adopted an aggressive style in which they 'dance on the wave, attacking it from all angles and reducing it to shreds'.⁶⁸

Underpinning these three styles are distinct philosophies based on beliefs about humankind's relationship with nature. According to Lopez, Hawaiians have benefited from 'extended experience' of the ocean and are therefore 'older and wiser (in terms of self preservation)'. They have 'traditionally exhibited an innate respect for the waves' and 'instead of attempting to impose their order on the waves they seek to join forces'.⁶⁹ While less presumptuous than Australian surfing culture with respect to beliefs about humankind's superiority over nature, cultural superiority nonetheless tinges Californian surfing. According to their philosophy, Californian surfers believe that humankind can, somehow, enhance the aesthetic value of waves. Finally, Australian surfers attempt to dominate nature by sheer aggression. It is a philosophy which has its origins in the formative years of the SLSA.⁷⁰

In the late 1950s, surfers began to debate style. Hawaiians resisted all efforts to modify their style. Indeed, it took nearly 10 years before an outsider – Australian Midget Farrelly – won at Makaha. Farrelly once caustically described Hawaiian surfing style as 'stand[ing] on the centre of your board and look[ing] like a man, if possible against the setting sun'.⁷¹ But the most bitter debates were between Australians and Californians. In mid-1966, the Australian magazine *Surfing World* published a conversation with Bob McTavish and Nat Young in which the pair boldly announced a 'new era'. According to Young, new era surfers went for 'blatant changes of direction [and] radical manoeuvres', looked for the 'most intense areas of the wave' and 'chas[ed] the curl without too much thought for aesthetics'.⁷² In the same edition, staff writer John Witzig wrote that the aesthetic grace and poise of post-war surfing had been swept away by 'the onslaught of impetuous youth' and replaced with aggression, power, and radical (creative) manoeuvres on short boards.⁷³ Several months later Young won the third world surfing championships at San Diego, California.

American surfers ignored Australian pronouncements. Instead, they hailed the emergence of Californian 'high performers'. The entire sport, Bill Cleary wrote in *Surfer* magazine, is following (Hawaii born and California resident) David Nuuhiwa's 'relaxed creativity'.⁷⁴ 'Rubbish', retorted Witzig:

[O]ur Nat Young completely dominated competition at the World Surfing Championships in San Diego. Has everyone forgotten that David was beaten? Thrashed? ... everything the pedestal of California surfing is being built upon [outdated board designs, restricted wave contests, limited manoeuvres] means nothing! The direction ... is towards dynamic and controlled aggression in surfing. Nat ... is part of this 'power' school of surfing: he has crushed the 'pansy' surfers of California We're on top and will continue to dominate world surfing.⁷⁵

It is little wonder that Hawaiian and Californian surfers regard Australians as intensely arrogant.⁷⁶

The protagonists, however, tended to reduce the debates over style to technology and overlooked their different philosophies and cultures. While conceding that the plastic machines they rode at the 1967 Duke Kahanamoku contest were 'a complete wash-out at Sunset',⁷⁷ McTavish and Young insist that their radical equipment and approach split the judges and captivated many Hawaiians and Californians.⁷⁸ Parmenter repudiates any suggestion of a technological advance. The 9 feet 4 inch long plastic machine ridden by Young, he claims, was only marginally shorter than the other boards ridden at the 1967 Duke contest; moreover, v-bottom boards had been around since the late 1930s. Parmenter gets closest to the truth when he says that the real issue was style and the place of the 'pose-on-the-nose'.⁷⁹ Yet, even he fails to acknowledge that underlying these different styles were irreconcilable philosophies concerning the interpretation of waves.

Debates over style fuelled dissension over judging methods and scoring; they led to accusations of corruption and bias. But the codification of competitive surfing stalled completely in the late 1960s with the onset of the counterculture. An amalgam of alternate lifestyles and political activism, the counterculture penetrated surfing and spawned a generation of soul-surfers, riders who scorned competition and danced purely for their spirit. Prominent Australian surfer Ted Spencer, for example, dropped out of competitive surfing for two years preferring instead to 'dance for Krishna'.⁸⁰

The anti-competition ethic of soul-surfing delayed professional competition by perhaps a decade. Even though many surfers rejected soul-surfing's alternate philosophies,⁸¹ professional surfing developed only after the counterculture waned in the early 1970s. Ironically, however, the work-

is-play philosophy of the counterculture led a group of astute Australian, *haole*-Hawaiian and South African surfers to identify a professional circuit as the means by which competitors, administrators and a host of small business people could pursue eternal hedonism. In 1976, they launched a professional world tour.

Australians have dominated the men's circuit since its inception and the women's circuit since 1989.⁸² By contrast, only one Hawaiian has won a men's world title. The success of the former is the result of a hegemonic process by which Australians have defined acceptable surfing style. Ultimately this style is historically and culturally rooted in an aggressive sporting ethos inherited from the life saving movement. By contrast, the lack of Hawaiian success in competition stems from the relaxed, hedonistic beach culture which pervades the Islands. The perennial controversy over Hawaii's place on the contest calendar illustrates the hegemonic ambitions of Australian surfers. There is almost universal agreement among surfers that from a theatrical and dramatic perspective, the circuit should climax in the giant waves of Hawaii in December. Australian officials, however, favour a June to April calendar which begins in South Africa and finishes in Australia. They argue that Hawaii is geographically isolated and that the Hawaiians do not promote the sport. They claim that Hawaiians have not attracted sponsors from the American mainland, and do not give professional surfers due recognition. Former executive director of the Association, Australian Graham Cassidy, argues that 'the best possible spotlight on the year end season ... can't be achieved in Hawaii' where 'they tend to treat [surfing] as a lifestyle thing rather than a serious sport'.⁸³ Although the circuit currently concludes in Hawaii it is a tenuous arrangement.

Conclusion

In a recent article, Dave Parmenter argues that surfboards now represent 'a closed system. There will be nothing new from outside that system other than new materials. The parameters of functional design have long been established: roughly six-foot to twelve-foot, seventeen to twenty-four inches wide, two to four inches thick. Within those boundaries lie our design alphabet'.⁸⁴ Parmenter's claim reeks of technological determinism and treats history 'as a closed and self-sufficient system, from which all events may be deduced'.⁸⁵ But surfing is a complex form of dancing, the different styles of which are as much the by-products of historical and cultural systems as the 'design alphabet' of technology. When surfers dance they translate a host of subconscious philosophies and cultural tastes, values and perceptions into movement. Nor are history and culture ever closed or

inevitable. Many younger surfers no longer view waves as a 'natural aesthetic sign system';⁸⁶ rather, waves are extensions of urban life:

the typical young surfer of today, affected more by MTV and street culture than our own heritage, no longer has any reverence for the wave. Surfing, for them, has become another 'fuck you' sport like skateboarding, with the wave becoming just another piece of urban terrain to scrape up against and deface. Their surfing is base nihilism. Like their punk/thrash anthems, the key is to abrade: learn three notes, crank up the amps and disguise an utter lack of talent with sheer noise.⁸⁷

While contemporary technology facilitates abrasive surfing, in ways that planks, longboards and malibus clearly could not, this does not mean that ultralight three-finned boards have determined this style. As the references to MTV and street culture suggest, the critical questions for historians of surfing are why have surfers lost their 'sense of wonder' at the majesty of waves, and why do they no longer respect waves, or marvel at their beauty? The immediate physical environment of surfing provides part of the answer. Today the overwhelming majority of surfers live in conurbations. Instead of escaping into nature they immerse themselves in greasy, foul-smelling waters that assault and jolt their senses. The ocean is the built environment's sewer and, like the dirty ashen skies above and the pallid concrete ribbons and blocks which abut urban beaches, it is a constant reminder of human degradation and contamination. Crowds are a further reminder: at urban beaches surfers find no relief from aggressive competition and no space for reflection, contemplation or relaxation. As well as the physical environment, historians should also 'search' the *zeitgeist*. The prevailing *zeitgeist* reflects two decades of radical economic restructuring and accompanying social and political adjustments⁸⁸ and, in particular, the response of youth movements to those changes. Surfing has been an integral part of post-Second World War youth movements. In the 1960s, surfing had a positive, albeit alternative, focus. But as the quote above reveals, today it expresses spontaneity, individualism, self-expression, competitiveness, profanity, nihilism and general social dissatisfaction.⁸⁹

In summary, when surfers dance they express, within the bounds of technology, an interpretation of their immediate, and constantly changing, physical and cultural environments.

NOTES

1. Nat Young, *The History of Surfing* (Palm Beach, Sydney: Palm Beach Press, 1983), p.197.
2. Dave Parmenter, 'Epoch-alypse now: Postmodern surfing in the age of reason' (hereafter 'Epoch-alypse now'), *The Surfers Journal*, 4, 4 (1995), 113. Wearing a wig and a bikini, Muñoz doubled for Sandra Dee (Gidget) in the 1959 Hollywood surf film *Gidget*.
3. Frank Margan and Ben Finney, *A Pictorial History of Surfing* (Sydney: Paul Hamlyn, 1970); Kent Pearson, *Surfing Subcultures of Australia and New Zealand* (hereafter *Surfing Subcultures*) (St Lucia, University of Queensland, 1979); Young (1983), *The History of Surfing*.
4. Pierce Julius Flynn, 'Waves of Semiosis: Surfing's Iconic Progression' (hereafter 'Waves of Semiosis'), *The American Journal of Semiotics*, 5, 3/4 (1987), 400.
5. Ibid.
6. The British imperial measurement system still survives in surfing. Dimensions: 1" = 2.54 cm; 3" = 7.62 cm; 6" = 15.24 cm; 9" = 22.86 cm; 12" = 30.48 cm; 18" = 45.72 cm; 24" = 60.96 cm; 6' = 1.83 m; 7' = 2.13 m; 8' = 2.44 m; 9' = 2.74 m; 10' = 3.05 m; 11' = 3.35 m; 12' = 3.66 m; 15' = 4.57 m; 18' = 5.49 m. Weight: 1 pound = 0.45 kg; 5 pounds = 2.25 kg; 20 pounds = 9 kg; 50 pounds = 22.5 kg; 80 pounds = 36 kg; 100 pounds = 45 kg; 125 pounds = 56.25 kg.
7. Ben Finney, 'Surfing in Ancient Hawaii', *The Journal of the Polynesian Society*, 68, 5 (1959), 327, 330 and 3324; Duke Kahanamoku and Joe Brennan, *World of Surfing* (Sydney: Angus and Robertson, 1968), pp.18–21.
8. Leonard Lueras, *Surfing: The Ultimate Pleasure* (hereafter *Surfing*) (New York: Workman Publishing, 1984), p.104.
9. Reg Harris, *Heroes of the Surf: Fifty Years' History of Manly Life Saving Club* (hereafter *Heroes of the Surf*) (Manly, Sydney: Manly Surf Life Saving Club, 1960?), pp.53–4.
10. Ibid., p.54. Kahanamoku gave his first demonstration at Freshwater beach and his board is on display in the clubrooms of Freshwater Surf Life Saving Club.
11. Sandra Kimberley Hall and Greg Ambrose, *Memories of Duke: The Legend Comes to Life* (hereafter *Memories of Duke*) (Honolulu: Bess Press, 1995), p.50.
12. As a young teenager West tried unsuccessfully to ride Paterson's alai'a board. However, he and a small number of others persevered on boards built by Les Hinds, a local builder. Their craft were typically 8 feet long, 20 inches wide and 1½ inches thick; they weighed around 35 pounds. During his visit Kahanamoku taught West the finer principles of riding and Claude became Australia's most accomplished surfer. Harris (1960), *Heroes of the Surf*, p.55.
13. C. Bede Maxwell, *Surf: Australians Against the Sea* (hereafter *Surf*) (Sydney: Angus and Robertson, 1949), pp.239–40.
14. Sean Brawley, *Vigilant and Victorious: A Community History of the Collaroy Surf Life Saving Club 1911–1995* (hereafter *Vigilant and Victorious*) (Collaroy Beach, Sydney: Collaroy Surf Life Saving Club, 1995), pp 33–4. Brawley identifies Bert Chequer as the first commercial surfboard builder in Australia. Based in Sydney, Chequer supplied boards to surfers in New South Wales and Victoria. He made his boards, which he sold for £5, from kiln-dried Californian redwood. Chequer coated the boards, which took two days to make, with linseed oil and Velspar yacht varnish. Ibid., pp.48 and 95.
15. Blake grew up in Wisconsin. 'His life changed when he went to see a newsreel of the Antwerp Olympics. Standing in the Detroit theatre lobby was Duke, the world champion. Blake asked to shake his hand. 'He held out his big, soft paw, and gave me a firm, hearty handshake'. Blake moved to Los Angeles, took up swimming and surfing, and worked as a lifeguard. He then moved to Hawaii where he lived for 25 years as part of Duke's 'ohana'. Kimberley and Ambrose (1995), *Memories of Duke*, p.46.
16. Lueras (1984), *Surfing*, p.82.
17. Ibid., p.107.
18. Maxwell (1949), *Surf*, p.240.
19. Young (1983), *The History of Surfing*, p.56.
20. Ibid., p.61.
21. Ibid., p.59.

22. Lueras (1984), *Surfing*, pp.111 and 113.
23. Ibid.
24. Young (1983), *The History of Surfing*, p.63; Greg Noll, *Da Bull: Life Over the Edge* (hereafter *Da Bull*) (Bozeman, Montana: Bangtail Press, 1989), p.32.
25. Young (1983), *The History of Surfing*, p.75.
26. Bob McTavish, 'So how come no one asked sooner?' (hereafter 'So how come'), *The Surfers' Journal*, 4, 3 (1995), 48.
27. Young (1983), *The History of Surfing*, p.101.
28. McTavish (1995), 'So how come', 48.
29. Ibid., 49–51.
30. Ibid., 54.
31. Young (1983), *The History of Surfing*, p.103.
32. McTavish (1995), 'So how come', 48.
33. Parmenter (1995), 'Epoch-alyse now', 111.
34. McTavish (1995), 'So how come', 54.
35. Ibid., 53.
36. Young (1983), *The History of Surfing*, p.105.
37. McTavish (1995), 'So how come', 54.
38. Young (1983), *The History of Surfing*, p.105.
39. Ibid., p.159.
40. Ibid., pp.159–60; Adam Blakey and Neil Ridgway, 'Don't turn the heat off while Dick's still brewing', *Tracks* (May 1996), 91.
41. Young (1983), *The History of Surfing*, p.163.
42. McTavish (1995), 'So how come', 55.
43. Lueras (1984), *Surfing*, p.107.
44. Noll (1989), *Da Bull*, p.16.
45. Flynn (1987), 'Waves of Semiosis', 400.
46. Parmenter (1995), 'Epoch-alyse now', 115.
47. Lueras (1984), *Surfing*, p.107.
48. Pearson (1979), *Surfing Subcultures*, p.57; Barry Galton, *Gladiators of the Surf* (Sydney: Reed, 1984), p.35.
49. Flynn (1987), 'Waves of Semiosis' 400.
50. Ben Finney and James Houston, *Surfing: The Sport of Hawaiian Kings* (Johannesburg: Hugh Keartland, 1966), p.61.
51. Surf Life Saving Association of Australia, *Twentieth Annual Report 1927-28* (Sydney, 1928).
52. Harris (1960), *Heroes of the Surf*; Galton (1984), *Gladiators of the Surf*; Maxwell (1949), *Surf*; Brawley (1995), *Vigilant and Victorious*.
53. For a fuller history see Douglas Booth, 'War Off Water: The Surf Life Saving Association and the Beach', *Sporting Traditions*, 7, 2 (1991), 135–62.
54. Pearson (1979), *Surfing Subcultures*, p.52; Brawley (1995), *Vigilant and Victorious*, p.217.
55. Maxwell (1949), *Surf*, p.245.
56. Harris (1960), *Heroes of the Surf*, p.55.
57. Maxwell (1949), *Surf* p.237. On another occasion West rescued the Governor General of Australia, Sir Ronald Munro-Ferguson, although that rescue did not involve a board.
58. Sean Brawley, *Beach Beyond: A History of the Palm Beach Surf Club 1921-1996* (Sydney: University of New South Wales Press, 1996), p.557.
59. Pearson (1979), *Surfing Subcultures*, p.57.
60. Lueras (1984), *Surfing*, pp.113–14.
61. Douglas Booth, 'Ambiguities in Pleasure and Discipline: The Development of Competitive Surfing', *Journal of Sport History*, 22, 3 (1995), 189–206.
62. Gerry Lopez, 'Attitude dancing', *Surfer*, 17, 2 (1976), 104.
63. Ibid., 101.
64. Parmenter (1995), 'Epoch-alyse now', 112.
65. Lopez (1976), 'Attitude dancing', 101.
66. Parmenter (1995), 'Epoch-alyse now', p.118.
67. Ibid., p.117.

68. Lopez (1976), 'Attitude dancing', 103.
69. Ibid., 10–34.
70. According to orthodox surfing history, Australian surfers fled the SLISA en masse with the arrival of malibu boards and cheap transport: technology freed surfers from the rigorous discipline and competitive ethos of the life saving movement. Closer examination, however, reveals that the mass exodus did not occur until the late 1960s with the onset of the counterculture (see below). But even those surfers who left the SLISA took with them the competitive ethos of life saving. Douglas Booth, 'Surfing '60s: A Case Study in the History of Pleasure and Discipline', *Australian Historical Studies*, 26, 103 (1994), 262–79.
71. Craig McGregor, *Profile of Australia* (Chicago: Henry Regnery, 1968), p.287.
72. Young (1983), *The History of Surfing*, p.101.
73. John Witzig, 'An end to an era', *Surfing World*, 8, 1 (1966), 37–41.
74. Bill Cleary, 'The high performers', *Surfer*, 8, 1 (1967), 38–49.
75. John Witzig, "'We're tops now'", *Surfer*, 8, 2 (1967), 46–52.
76. Lopez (1976), 'Attitude dancing', 103; Phil Jarratt, 'Jaw war on the North Shore', *Surfer*, 17, 6 (1977), 46–8.
77. McTavish (1995), 'So how come', 56. In McTavish's words, 'it wasn't entirely without justification' that contest director Fred Hemmings 'called me the "spin-out king"'.
78. Ibid., 56; Young (1983), *The History of Surfing*, p.103.
79. Parmenter (1995), 'Epoch-alyse now', 111. Young insists that the difference in boards was substantial: 'someone of my size from California or Hawaii would have ridden a board 10 to 11 feet long and at least 4 inches thick. Young (1983), *The History of Surfing*', p.101.
80. Interview, *Tracks* (August 1974), 10.
81. The 1968 world surfing champion, Fred Hemmings from Hawaii, publicly denounced soul-surfers for impairing surfing and society, 'Hemmings is hot', *Surfer*, 9, 5 (1968), 68.
82. Between 1976 and 1992 six Australian men won 11 of the 17 world titles; an Australian finished in the top two in each of those years except one. Australians also filled at least eight of the top 16 places in all but three years in that period. In 1992, Australians secured a remarkable 10 places in the top 16. Two Australian women won the four world titles between 1989 and 1992 and in those same years, Australians filled at least six of the top eight places. Australian domination of men's professional surfing waned between 1993 and 1995 following the introduction of the World Qualifying System. Only the top 16 of the 44 surfers on the 1992 World Championship Tour received invitations to compete in 1993. The other 28 graduated from contests which made up the World Qualifying System. Australian surfers lost their places after Brazil and California invested heavily in World Qualifying contests; their nationals qualified for the World Championship Tour without leaving home. In 1993, only one Australian qualified for the 1994 circuit, and in 1995, 21 of the top 44 surfers came from the United States, including Hawaii. Australian surfing officials responded by organizing more Qualifying contests. In 1996, three Australians finished in the top 10 and Australia secured 20 of 44 positions for 1997.
83. 'Oh good, an umbrella sponsor', *Australia's Surfing Life*, 63 (1993), 36; 'Finale of world tour is back at home', *Sydney Morning Herald* (3 January, 1994).
84. Parmenter (1995), 'Epoch-alyse now', 122.
85. Alex Callinicos, *Theories and Narratives: Reflections on the Philosophy of History* (Cambridge: Polity, 1995), p. 210.
86. Flynn (1987), *Waves of Semiosis*, 400.
87. Parmenter (1995), 'Epoch-alyse now', 117.
88. David Harvey, *The Condition of Postmodernity* (Oxford: Basil Blackwell, 1989); Jeffrey Alexander, 'Modern, Anti, Post, Neo', *New Left Review*, 210 (1995), 63101.
89. Duncan Humphreys, "'Shredheads go Mainstream"? Snowboarding and Alternative Youth', *International Review for Sociology of Sport*, 32, 2 (1997), 147–60.