

THE VALUE (OR OTHERWISE) OF SOCIAL MEDIA TO THE MEDICAL PROFESSIONAL: SOME PERSONAL REFLECTIONS

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ABSTRACT

Between June 2015 and June 2018, I was engaged in a 28-day hearing conducted by lawyers representing the Health Professions Council of South Africa (HPCSA). I faced a charge of unprofessional conduct for a seven-word Tweet that I typed in February 2014. The charge of unprofessional conduct was based essentially on the accusation that by answering a request for information on Twitter I had automatically entered a doctor–patient relationship; I had given medical advice that was incorrect because it was ‘unconventional’ and not ‘evidence-based’; I had not fulfilled my duty of care to the patient; and that I had potentially put the lives and health of ‘millions’ of infants at risk. It was not difficult to disprove all these concocted charges even though it took 28 days in court at a total cost to both parties combined that probably exceeded R15 million. My legal team and I were able to show that: (i) I had not entered a doctor–patient relationship on Twitter; (ii) I had provided medical information not medical advice in response to a ‘we’ question; (iii) the information I had provided was 100% compatible with the South African and World Health Organization Dietary Guidelines for complementary infant feeding; and (iv) in the broader picture, the general dietary advice that I favour – the low-carbohydrate high-healthy-fat diet – is neither ‘unconventional’ nor ‘not evidence-based’. While on the surface the trial was ostensibly about the ‘dangers’ of a seven-word Tweet, there were a number of covert agendas acting out behind the scenes. It was surprising, for example, that so many of the key witnesses for the prosecution had links to a shadowy international front organisation, the International Life Sciences Institute (ILSI), whose established goal is to control national dietary and exercise policies on a global scale and ‘to marginalise unfavourable positions’, mine included. Or perhaps an undisclosed aim was to restrict the future freedom of speech of practitioners registered with the HPCSA. For had I lost the case, registered practitioners would no longer be absolutely certain that any information they shared when either lecturing, writing, speaking in public or interacting on social media on any medical topic whether dealing with individuals (medical advice) or groups (medical information), might not result in their being charged as was I. By winning this matter, this danger has been averted. I expand the article by explaining why I believe that, if used properly, social media tools such as Twitter have enormous educational potential for scientists and students especially, but also for clinicians.

Keywords: social media, medical professional, value

INTRODUCTION

At least some readers of this publication are probably aware that I was responsible for one of the more expensive Tweets (see Figure 1) in the short history of Twitterdom.

This Tweet resulted in my being charged by the Health Professions Council of South Africa (HPCSA) for unprofessional conduct. It became known as the ‘Banting for Babies’ Tweet that launched ‘The Nutrition Trial of the Century’. The trial lasted four years including 28 days in ‘court’. The details of the trial and how it began are described in two related books.^{1,2} Importantly, the information presented in this ‘Banting for Babies’ Tweet reflects precisely the national^{3–6} and international⁷ guidelines for infant feeding, absolutely to the letter. Interestingly, the South African Dietary Guidelines^{3–5} were written by the two professors

SEVEN WORDS THAT SPARKED A LEGAL FIRESTORM

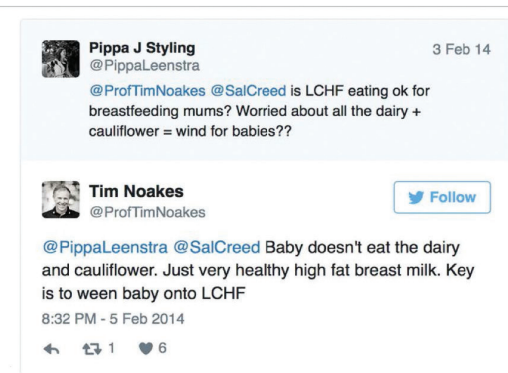


Figure 1: The original Tweet

of Nutrition and Dietetics who appeared as the chief witnesses for the prosecution in my trial.

This Tweet which I typed on 5 February 2014 at 8:32 pm caused me to be reported to the HPCSA within 12 hours. I was officially notified of the complaint for the first time on 20 February 2014 and my official response was dated 2 May 2014. The complaint and my response were reviewed by the HPCSA's Fourth Preliminary Committee of Inquiry (FPCI) under the chairmanship of a South African university professor of Ethics on 22 May 2014.

After two days' deliberation the FPCI could not decide whether or not to charge me. Instead it waited for the publication of two other documents – one became known as the Naudé meta-analysis and which we showed is seriously flawed,⁸ not least because it included only high-carbohydrate diets which have no relevance whatsoever to the low-carbohydrate diet I promote – as well as a letter from four senior professors in the Faculty of Health Sciences (FHS) at the University of Cape Town (UCT).^{1,2,9} The letter, written conveniently just before the FPCI met for a second time, was published in a local daily newspaper and shared with the deans of all the South African medical faculties, as well as the National and Western Cape Ministers of Health. Clearly, I was now considered a major threat to the health of all South Africans.

Having considered this additional material and without offering me the opportunity to respond, as is my constitutional right, in September 2014 the FPCI resolved to charge me for the following:

That you are guilty of unprofessional conduct, or conduct which, with regard to your profession is unprofessional, in that during February 2014, you acted in a manner that is not in accordance with the norms and standards of your profession in that you provided unconventional advice on breastfeeding babies on social networks (Tweet).

At this point of the story, the obvious question becomes: How was it possible for a medical practitioner to be charged for 'unprofessional conduct' in providing 'unconventional advice' when all he did was mention scientifically valid *information* on social media in answer to a generalised 'we' – 'mums' and 'babies' – question from a concerned mother? This information that is compatible with all the globally accepted guidelines and which cannot be misconstrued as medical *advice*.

During the 'trial' it became clear that powerful but covert influences were at work behind the scenes. It became increasingly obvious that my trial was never about an innocuous seven-word Tweet. For example, my legal team ultimately found unambiguous evidence of collusion between the complainant in her position as president of the Association for Dietetics of South Africa (ADSA), and the academic who at that time served as the representative for the Nutrition and Dietetics Profession on the HPCSA Board. Using the Promotion of Access to Information Act (PAIA), my legal team recovered a year-long string of emails between the complainant and the HPCSA representative for Dietetics and Nutrition. The correspondence began in June 2014, that is, while the FPCI was still in the process of deciding

whether or not to charge me. In that correspondence the complainant appealed to the HPCSA to deal decisively with 'The Tim Noakes Problem'. A year later, on 4 June 2015 on the eve of the commencement of the trial, the HPCSA representative informed the complainant:

Hi XXX,

Dit is by the vergadering bespreek.

Maar ons is duidelik laat verstaan deur Adv ZZZZ, Senior Bestuurder van Legal, dat ons nie mag kommunikeer wat die besluit van die Raad is nie.

Jammer maar ek kan nie sê what die plan is nie!

Groetnis, YYY.

One naturally assumes that in overseeing complaints against its members, the HPCSA and all its committees including the FPCI and the senior manager (Legal), will act honourably and impartially. Clearly this did not happen in this matter.

As our senior counsel argued during the trial, ADSA and its president were acting as 'disgruntled dietitians' who were not happy that some members of the South African public were listening 'more to Noakes' than to them (and their association).

But I had become a target not only of ADSA but also of one of its premier supporters, a 'shadowy industry group'¹⁰ known rather euphemistically as the International Life Sciences Institute (ILSI). The reality is that ILSI is a front organisation^{10–15} for a number of food and pharmaceutical companies, the over-riding goal of whose actions is to control national dietary^{10,15} and exercise policies globally:

Emails reveal a pattern of activity in which ILSI sought to exploit the credibility of scientists and academics to bolster industry positions and to promote industry-devised content in its meetings, journals and other activities. *ILSI also actively seeks to marginalise unfavourable positions* (my added emphasis).¹⁴

Unwittingly I had become an ILSI target.¹⁶ I first attracted ILSI's interest as a result of my work exposing the misrepresentation and distortion of science by one of its major funders.^{17,18} Their promotion of fluid overconsumption during exercise had produced a novel iatrogenic athletic disease, exercise-associated hyponatraemia (EAH) including the sometimes-fatal, exercise-associated hyponatraemic encephalopathy (EAHE).^{17–19}

An American journalist who travelled to South Africa to investigate, detected the fingerprints of ILSI all over my HPCSA trial.¹⁶ For example most of the team of academics assembled by the prosecution had direct links to ILSI. Two were former presidents of the South African branch of ILSI, including the professor who wrote the South African dietary guidelines. A third academic at the UCT FHS, who assisted the prosecution during my trial, was in receipt of an ILSI grant^{20,21} awarded during or shortly before that trial began. During the trial, a student in her division of Human Nutrition also received an ILSI student award.

Let us now consider what my trial teaches about the potential risks that medical practitioners might run when they begin engaging on social media, including Twitter.

DOES ACTIVITY ON TWITTER PRODUCE A DOCTOR–PATIENT RELATIONSHIP?

During the trial the prosecution argued that the simple act of answering her question on social media (see Figure 1) meant that I had entered a doctor–patient relationship with the mother who posed the question to which I had responded. As a result, I had a duty of medical care that I had apparently not honoured. For two reasons, this line of argument proved particularly problematic for the prosecution.

In the first place, within days of the publication of my Tweet, the complainant and another HPCSA-registered, ADSA dietitian, had both contacted the enquiring mother via Twitter; providing not just personalised medical advice – along the lines that she should not follow my ‘advice’ – but they had also provided their contact details. The mother contacted both. Hence, according to the logic of the prosecution’s case against me, there could be no question that both had provided direct medical advice via Twitter and had therefore developed a practitioner–patient relationship with the mother. As a result, both were now guilty of the identical actions for which I had been charged – proving medical advice/information to a patient on Twitter. Logically, the HPCSA should have moved quickly to charge both. This did not happen.

Worse, if my actions had established a doctor–patient relationship with the mother well before these dietitians entered the fray, then both were guilty of a second equally serious transgression – supersession. For if I did indeed have a doctor–patient relationship with the mother, then both dietitians had effectively stolen my ‘patient’ from me.

When exposed to this line of argument under cross-examination, the complainant visibly wilted. And when the prosecution’s chief ethics witness, a professor of Psychiatry from a local medical faculty, was asked by a member of the HPCSA Professional Conduct Committee (PCC) overseeing my case, why the HPCSA had not charged these two dietitians as it had charged me, the best answer he could conjure up, was to the effect that it is important that the HPCSA make an example of Professor Noakes.

In the end the FPCI could only conclude that I was never in a doctor–patient relationship with the mother; a fact she had fully acknowledged in an email already in February 2014 in which the mother stated that she had become confused by so much *information* from the two ADSA dietitians. Hence the goal of her original Tweet had been to seek medical *information*, not medical *advice*.

Therefore, my case established the precedent in South Africa that answering a ‘we’ question on Twitter does not produce a doctor–patient relationship.

DID THE MEDICAL INFORMATION I PROVIDED ON TWITTER REPRESENT A DANGER TO THE PUBLIC?

When the verdict in July 2017 went against the HPCSA – I won 10 decisions for, 0 against – the HPCSA unwisely chose to

appeal the decision of its own PCC. A second HPCSA PCC was constituted. Over the next year it considered all the evidence presented in the prior 25 days in court and heard additional day-long presentations from both legal teams.

During the appeal process the chief prosecution lawyer subtly changed the focus of the charge against me. Clearly, if the HPCSA was reluctant to act against the complainant and her dietitian friend, then any argument that I had been in a doctor–patient relationship with the mother, was no longer sustainable. To act against me but not against the two dietitians who were guilty of greater ‘crimes’ than was I, would clearly establish the bias of the HPCSA. Instead, the focus of the chief prosecution lawyer became that the (correct) information I had provided had the potentially to harm ‘millions’ of Twitter followers – the carefully chosen words of the prosecution’s principal ethics witness, the professor of Psychiatry, already mentioned.

The Appeal PCC decisively rejected that novel twist confirming that I was once more found innocent of all charges. The proceedings that had started four years earlier and had involved 28 days in court and had cost the HPCSA a conservatively estimated R10 million, finally drew to a close on 8 June 2018.

In the end I suspect that there were many individuals and organisations who saw opportunity in my prosecution and persecution. But the unanswered question remains: Why was the HPCSA prepared to invest so much money in what more sober minds than the seven members of their FPCI, should have told them was a futile gamble?

What if the HPCSA’s real motivation was the desire to rest absolute control of what registered South African practitioners are allowed to communicate in public, including on social media platforms such as Twitter and Facebook, in books, articles, lectures and public broadcasts?

For all those registered with the HPCSA, this is perhaps a key question arising from my trial.

THE DIFFERENCE BETWEEN MEDICAL INFORMATION AND MEDICAL ADVICE

A key distortion in the HPCSA case against me required the deliberate blurring of the explicit distinction between medical *information* shared with the general public and medical *advice* given to a specific patient as part of a well-defined doctor–patient relationship. The key difference is that medical *information* is information directed at many – for example, in answer to a ‘we’ question, that is, is it advisable that ‘we’, the general public, do either A or B? As opposed to medical *advice* which is directed to the individual in response to an ‘I’ question, that is, what should I myself (or a friend, or family member, or acquaintance) do in these circumstances?

Had I been found guilty of providing (correct) medical *information* on social media – in the guise that I was giving medical *advice* in a virtual medical consultation with a defined patient as part of a doctor–patient relationship – then the path was clear for the HPCSA to claim absolute control of what any HPCSA registered practitioner in any field would, in future, be allowed to say in absolutely any sphere of public communication.

For if I had been found guilty of providing (correct) medical *information* to the general public on Twitter, then logically the same must apply to any medical *information*, correct or otherwise but considered vexatious by the HPCSA, when conveyed in any form of communication. For example, in public lectures, in the print and broadcast media, in written articles and books, etc.

In this way the HPCSA would essentially have usurped the power necessary to control everything uttered by any of its registered practitioners in any sphere of human communication. Control would be wielded by the simple fear of censure and the potential financial ruin that would result from a guilty verdict in a protracted trial like the one to which I was subjected.

Indeed, a point worth making is that there is a clear absence of financial responsibility in the manner in which the HPCSA conducts its business. For the complainant takes no financial risk when laying a complaint; the professor of Ethics and the six members of her FPCI took no financial responsibility for the financial consequences to me of their decision to charge me in what was clearly a malicious prosecution driven by a multitude of covert agendas. And the HPCSA itself has no financial accountability for wasting millions of rand of its registered practitioners' hard-earned income, on what was always going to be a losing cause.

Of course, the idea that the HPCSA might actually seek such control, sounds ludicrous. But if the COVID-19 lockdown has taught us one thing, it is that we live in Orwellian times. And absolutely nothing should be considered beyond the bounds of possibility when it comes to control of the public's thoughts and actions in the modern (Orwellian) world.

So, while I was fighting for my professional and scientific credibility, there was another concealed fight going on in the background: the fight to prevent totalitarian control of what medical practitioners registered with the HPCSA are able to say in public to anyone regardless of whether or not that person is the practitioner's patient.

IN THE END, WHAT DID MY TRIAL ESTABLISH?

1. We won the case only because we were able to present irrefutable evidence that, when all the available evidence is truthfully and not selectively presented, what I had written in the Tweet and the dietary advice that I promote, is both conventional and strongly evidence-based. Even better, it actually works to improve human health.^{1,2}
2. This represented a global victory for those who believe that the dietary advice currently promoted and taught in medical schools, not just in South Africa but around the world, is a major cause of the growing ill-health of the global populations.
3. The act of providing *correct medical information* to the general public did not immunise me from prosecution. Nor has our proof that what I said is 'not unconventional' nor 'not evidence-based' ever been acknowledged by the professional and academic forces ranged against me. This includes colleagues from at least four South African universities. Instead, the dogmatic beliefs that we refuted^{1,2} continue to be taught as if nothing has changed.

4. Providing *information* on social media in response to a 'we' question, does not create a doctor–patient relationship.

5. To ensure that a medical practitioner does not risk entering a doctor–patient relationship as a result of their interactions on social media, I suggest following these simple rules. These will ensure that the medical practitioner does not risk inadvertently providing what could be construed by the HPCSA as medical *advice*, rather than medical *information*:

- Provide direct answers only to 'we' questions – as did I (see Figure 1). Responding to a 'we' question ensures that the medical practitioner is providing medical *information*, not medical *advice*.
- Do not ever give a direct answer to a direct 'I' question because this constitutes medical *advice* and the medical practitioner will not be able to defend themselves in case of a complaint to the HPCSA. For example, if a patient asks even something as innocuous as: Should I take vitamin D to reduce the risk of a fatal COVID-19 infection? – the answer must not be a definitive yes or no, however innocuous and uncontroversial the answer might seem. It's simply not worth taking the risk. Instead, I would avoid answering the question directly but would refer the questioner to the latest published meta-analysis addressing this question. Interestingly, one often hears South African medical practitioners giving direct medical advice in answer to 'I' questions on South African radio programmes. Given my experience, I would advise caution. It takes just one disgruntled listener/patient/medical colleague to file a complaint that might result in what I experienced. As my experience shows, being correct is no protection from prosecution. And no one can be absolutely certain that they are wholly exempt from resentful foes, patiently awaiting their opportunity.
- Never, ever present patient data to which only you and the patient are privy. But if the individual presents their evidence and asks for a comment (not advice) then that is quite different. For example, an individual with a high blood triglyceride concentration that is causing concern, can quite easily be told that a high-carbohydrate diet is the commonest cause of hypertriglyceridaemia so that many would conclude that a reduction in dietary carbohydrate might be a logical first step. Then one adds a few provisos about the need for re-testing and consultation with a medical practitioner who understands the value of a low-carbohydrate diet.
- My argument would be that if one has *information* that may benefit the individual and if one knowingly withholds that information, then that is unethical because withholding that information may cause harm. Our medical commitment is first to do no harm. Whether this would stand up in an HPCSA-directed trial is another matter, however.
- For what I also learned in the trial is that a common assumption seems to be that the recipients of information on social media have no capacity to think for themselves. It is simply assumed that they will blindly follow each and every piece of information they read, and that they have no responsibility to evaluate all the evidence available

to them and then to act responsibly having carefully considered that information. Instead, it is much easier to act the victim and make the information-provider the felon.

- For a more detailed review of professional responsibilities of medical practitioners on social media, I would suggest reading an article by Dr Brenda Kubheka published in the *South African Medical Journal*.²²

Let's finish up by describing why I persist on Twitter despite what I have described here.

MY INTRODUCTION TO TWITTER

I became interested in social media at the urging of environmental activist, Lewis Pugh (@LewisPugh), who as the result of a series of extraordinary and dangerous open ocean swims, is now the United Nations Patron of the Oceans. In April 2012 he suggested to me that Twitter would be the ideal medium to take my nutritional message to a larger audience. So, I began a journey, the destiny of which I could never have imagined.

At the time I did not appreciate that, if properly used, Twitter can be a quite extraordinary educational tool. And this is perhaps the element that should be highlighted.

If properly used, Twitter can provide anyone anywhere in the world with direct access at very low cost, to the most up-to-date thoughts of as many as one chooses, of the world's best thinkers in any number of different disciplines. When those experts also produce or reference lectures or publications that are open-access, one has immediate access without any effort to the cutting-edge knowledge in the most recent publications in those chosen disciplines. There is no longer any need to await the arrival of the medical or scientific journals that in any case, also carry much information that is not personally relevant. Instead, one is informed of the key scientific publications that one needs to know about, on the day they are first published.

I don't know how anyone wishing to be absolutely up-to-date in their medical or scientific speciality can anymore achieve that without using social media.

The sole limitation is the number of experts one wishes to follow. The sky is literally the limit. The more one follows the more information to which one will be exposed.

Importantly, the experts one follows will also attract the attention of those who disagree vehemently with their opinions. In this way social media provide the opportunity to receive a balance of scientific and medical opinions (if one so wishes).

My conclusion is that the easiest way to stay current with the most up-to-date information in one's discipline is via social media, especially Twitter.

Interestingly, my Twitter account has attracted attention not just because of the 'Banting for Babies' Tweet. One study found that I am the most active science tweeter within the South Africa's academic community.²³ Another listed this account as the fourth most-accessed 'scientific' Twitter account in the world. The account has also interested researchers in social media studies of science communication,^{24–28} including a report which is the

first to define the novel phenomenon of online academic bullying (OAB),²⁹ based on my experiences.

Next, I will explain how one goes about achieving this.

HOW DOES TWITTER WORK?

Twitter is a messaging system in which one has the ability to immediately express one's ideas and opinions in the form of 280-character Tweets. These Tweets are circulated specifically to those who have chosen to 'follow' you, known as your 'followers'. But your Tweets are also available to anyone who has access to Twitter.

At the same time – and this is the real key I've already referred to – one can choose to follow anyone who has a Twitter account and who has special expertise in the area of one's interest. I follow about 130 people. These are the people whom I consider to be the leaders in their fields that are of interest to me, and who tweet reasonably regularly, usually a few Tweets a day.

In this way I remain up-to-date on what those whom I consider to be experts in my fields of interest, consider to be especially important.

By analogy it's as if I check in each day with 100–150 of the very best teachers in the world on their daily ward rounds when they are discussing what they currently find interesting. By observing their Tweets, I know exactly what it is that each day they find sufficiently interesting that they wish to share that information with the rest of the world. Provided I choose the top 100 or so people in the fields of my interest, it truly is as if I am attending a daily conference addressed by the very best in my field, explaining what they are thinking and doing each day.

In other words, it is the most up-to-date information in the field presented by the true experts. And all at no cost and from the convenience from one's home or office. Of course, given 100 or so 'experts', it's highly improbable that one will be receiving only one line of opinions. Besides receiving information from all these sources, one has the option to construct one's own Tweets in which one shares one's own opinions on whatever topic one finds of interest. There simply is no other way of which I am currently aware, that provides this incredible access to knowledge. It is an astonishing opportunity and a remarkable gift.

HOW DOES ONE START?

One starts by downloading the Twitter app and setting it up on your cellphone or computer or usually both. Once you have a presence on Twitter you need to decide how you plan to use it.

My principal focus is to promote science in the subjects in which I am interested – principally nutrition, especially low-carbohydrate diets, but also human sporting performance. Plus, whatever else catches my attention at any given moment. I am currently interested in the COVID-19 pandemic and there is no better place to receive most of the information than on Twitter. However, it is also clear that Twitter is currently being heavily censored as is Facebook and YouTube. Anything that conflicts with the major doctrines of the current mainstream media runs the risk of being removed.

To monitor what is happening in these disciplines, I follow those persons who are active on Twitter whom I also know are producing high-quality science in the fields of my interest. Every day their Tweets then appear in my Twitter feed and so I am fully informed about how they are thinking; the research they are performing; the scientific articles and books they are reading and writing; and the lectures they are giving.

My advice for most registered practitioners would be to focus on Twitter purely as an educational tool that can provide access to the individuals and research findings that are especially relevant in one's field.

Twitter may just be the cheapest and most time-economical technique for achieving this. It really is worth a try.

WHAT IS THE UPSIDE OF TWITTER?

The two upsides of Twitter are that if one believes one has a message to share with a large number of people beyond one's own immediate social circle, it provides that opportunity. The second upside is the opportunity to access the medical and scientific opinions of the world-leaders in one's field at essentially no cost and with minimal effort.

WHAT IS THE DOWNSIDE OF TWITTER?

The downside of Twitter is that one exposes one's opinions potentially to millions of people and it is utterly impossible that all of those persons will agree with your opinion. Many will disagree vehemently with you and will feel it is their special responsibility to let you know. When they do this using the most disagreeable and disrespectful language, they become trolls.

HOW DO YOU CONTROL TROLLS?

When I was a Twitter novice, I believed that it was my scholarly responsibility to respond diplomatically to anyone who wished to troll me regardless of how rude and uncivil each was. With time I have realised that trolls have their own personal issues and use their incivility towards me as some sort of self-justification for their personal failures in life. I have learned that there was nothing I could do to bring them happiness, so I have learned to 'block' them. Blocking is a method provided on Twitter that prevents the blocked person from accessing the Twitter account of the blocker. Trolls have no interest in scholarly debate, so their removal from one's Twitter circle can be performed without remorse.

CONCLUSION

Despite the discomfort that my seven-word Tweet caused me, I do not for one moment regret the time I have spent on Twitter over the past eight years. Ironically, the information I have learned from the experts that I follow on Twitter became, as described,^{1,2} the basis for my defence in my trial before the HPCSA. Even though I am retired and not involved daily in academia, Twitter provides me with as much scholarly information each day as I ever received in the years of my career as a researcher and teacher. This is perhaps as high a recommendation as I can give for the value of social media for the medical and scientific professions.

DECLARATION OF CONFLICT OF INTEREST

The author declares no conflict of interest.

This article has been peer reviewed.

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