Correspondence

Dear Editor

I have a hypothesis about the prescribing of PPIs for GORD and dyspepsia, which may or may not have any basis in fact, but is based on my observations as a GP over the past 9 years.

PPIs are extremely effective drugs. Usually, by the time that people consult me with GORD or dyspepsia, they have already tried at least one non-prescription drug: either antacids, or in many cases also an H2RA (recommended by the pharmacist after the antacids were not sufficiently effective). Having established they have no 'red flags', and discussed lifestyle factors, I prescribe a PPI. The effectiveness of this is such that after a period of time, the patient usually stops taking it every day. After a few days, their symptoms return, but they have their trusty PPI on hand to take again for another few days. For those patients who are in the habit of taking drugs every day, they include it as part of their routine, and are reluctant to stop or reduce it for fear of their symptoms returning. For those patients who 'don't like taking pills', they know that taking a PPI will be effective on an intermittent basis (in a way their antacids and H2RAs weren't), so they continue to ask for prescriptions for it when they run out. Your figures show that the average patient who has been prescribed a PPI takes it on 203 days out of 365 per year, with the peaks for the groups 'under 90 days' and 'over 270 days' being the two different groups I outlined above.

I hypothesise that a similar 'effectiveness trap' applies to inhaled corticosteroids for asthma. Beclomethasone is effective for asthma prevention, but the level of compliance required to achieve that effect is higher than with fluticasone. I believe very few asthmatics take their preventer as prescribed (i.e. 14 times per week, if prescribed as a twice daily dose). With beclomethasone, the effect of incomplete compliance is that their asthma remains poorly controlled. With fluticasone, they experience good asthma control even without good compliance. The unfortunate corollary is that once they perceive that fluticasone "works", they actually take their preventer inhaler more frequently and this is not ideal as they end up getting more steroid than they need.

Thus I fear bpac may be fighting a losing battle with trying to reduce prescribing of PPIs and high-dose inhaler corticosteroids. I acknowledge that these are merely observations, and would require studies to be done to see if they have any basis in fact.

Yours sincerely,
Dr Julyan Lawry

Send your letters to
'Correspondence'
PO Box 6032
Dunedin,
or email *editor@bpac.org.nz*

Dear Editor

I refer to your comments regarding Losec prescribing. You continue to be perplexed by the prescribing habits of General Practitioners. I can only speak for my own practice which is Low Access with over 4000 patients.

The simple answer is that Losec is one of the most effective drugs that has been presented to the market over the last 15 years.

In my view, it has literally reduced the number of acute ulcerations and subsequent morbidity to almost zero, has with continued use prevented long term complications of excess acid production, and finally has probably reduced gastric surgery by 90%.

The truth is that this is a very effective drug and General Practitioners by nature always move to the most effective drug when treating their patients. This is the simple answer to why there is no change in prescribing habits.

However, we should consider the converse of what would be happening if Losec and Zantac were not available. This would take me back some 34 years now to 1974 and 1975 when the treatment of reflux, ulcers and diseases related in general to high acid production and helicobacter was ineffective and almost a waste of time.

The truth is that these medications have improved the morbidity considerably in leaps and bounds and something that we were probably not expecting to happen. They are in my view the wonder drugs of the last 10 to 15 years and it is a real security to be able to prescribe these drugs with the confidence that in nearly every case they will work.

Yours faithfully
Dr G M Beacham

Correspondence

Dear Editor

RE: Vitamin D

Your advice on vitamin D was probably fine for the elderly who I generally find are happy to take vitamin D almost without question. However **virtually all of my young patients (including children) are at risk** – 'People unable to obtain regular sun exposure for any reason'. I have tested perhaps too many people and found nearly all of them have low Vitamin D levels (less than 50) and of the remainder most are in the low part of the normal range (50 to 90) and I note some experts recommend levels over 60 or even over 90 – **you made no comment on optimal levels and no comment on how to interpret tests at different time of the year.**

My experience suggests persons with unexplained fatigue particular with seasonal – late winter or just post winter flares in fatigue benefit a lot from vitamin D supplementation – (I concede it could be placebo) – is there any research on this? Also with muscle weakness from low vitamin D and evidence coming out for cancer reduction with vitamin D and even better treatment results for cancer with vitamin D supplementation I think that whilst most vitamin supplementation is dubious it looks as though vitamin D supplementation is worth while. **In young persons we are likely to be facing several problems including recommending doses for life, and fluctuating sun exposure.**

The first issue is convincing someone to take Vitamin D – if they are to take it for life the $50 cost of the test is small over a lifetime – I find a blood test convinces people where my best attempts don't. The other reason to check a level is if they are tired and the level is low a top up dose depending on the level is in my opinion useful rather than just maintenance.

I would give the 10 tabs mentioned in your article at levels less than 30 and 5 tabs for those above 30 but less than 50 – then after that I would give maintenance doses – **can we instead give a top up dose to everyone and avoid the need for the test or would that risk toxicity?**

Daily pill taking is not appealing to most people for life (even those already on pills) and regimens for maintenance probably can include 2 (stat) 1.25 mg cholecalciferol tabs each 3 months or even 4 (stat) each 6 months from what I have read – scripting each 6 months on recalls is a lot less problematic than each 3 months and more cost effective for everyone – is scripting each 6 months adequate – i.e. can the body store it for that long – **you made no comment on evidence for monthly Vs each 3, 4 or 6 months dose regimens** – it would be helpful if you would as I am now getting hospital doctors taking my patients off my 2 pills each 3 months and putting patients on one a month and I would like someone to summarise the evidence appropriately which is what I thought you were going to do when I verbally asked you about this topic last year. **If someone increases there sun exposure purposefully or by chance can toxicity occur at usual maintenance doses? And if so at what maintenance dose would we be free of that risk?**

I would appreciate your comments on the above issues and I suspect other GPs would too.

Dr Steve Searle
Dunedin

We asked Professor Ian Reid, University of Auckland, to answer Steve's questions.

Optimal Vitamin D Levels *There is considerable controversy regarding the optimal levels of 25-hydroxyvitamin D. There is general agreement that they should be greater than 50 nmol/L, but some authorities suggest levels greater than 75 nmol/L or even greater than 100 nmol/L. The latter values are based on observational data that may well be confounded by the fact that individuals with other illnesses spend less time outside and therefore have less sunshine exposure. This does not establish that their other illnesses are caused by the low vitamin D; rather the reverse may be the case. Also, to establish levels greater than 100 nmol/L would require medication of virtually the entire population. Such a step should not be taken without clear trial evidence that this is both safe and effective. At the present time neither is available. In the absence of authoritative data, my belief is that we should go for the conservative minimal value which is 50 nmol/L, and apply this to both children and adults. In order to maintain this level throughout winter, individuals not taking supplementation, need to reach higher levels during summer, since the seasonal fluctuation may be as much as 40 nmol/L.*

Vitamin D and Fatigue *Serum 25-hydroxyvitamin D levels <25 nmol/L are associated with clinical osteomalacia, which causes muscle weakness and pain. Therefore, it is likely that sub-clinical osteomalacia will have some associated muscle fatigue. Conversely, individuals who feel fatigued for other reasons are less likely to exercise and therefore less likely to get sun exposure, so may develop vitamin D deficiency as a secondary problem. Therefore, it is sensible to treat vitamin D deficiency in subjects with or without fatigue, but it should not necessarily be assumed that this will be associated with symptomatic improvement.*

Intermittent Dose *The half-life of serum 25-hydroxyvitamin D after dosing with oral calciferol is of the order of 90 days. Therefore, intermittent dosing is certainly acceptable, and many European countries have used annual dosing at the beginning of winter as a way of preventing deficiency developing during the period when sunlight exposure is least. The optimal dosing is likely to be different for each vitamin D preparation and for each region, where sunlight exposure will influence the required vitamin D dose. Therefore, if individual practitioners wish to try a variety of different dosing intervals, they probably need to validate them with serum 25-hydroxyvitamin D measurements. In Auckland, it is well established that monthly dosing with 1.25 mg (50,000 U) calciferol produces 25-hydroxyvitamin D levels greater than 50 nmol/L in almost all adult subjects.*

Toxicity *The seasonal variation in 25-hydroxyvitamin D levels in New Zealand is of the order of 20–40 nmol/L. The reference range is usually given as 50–150 nmol/L, though toxicity doesn't usually occur until much higher levels than this are reached. Therefore, there is a substantial safety margin, and changes in sunlight exposure are most unlikely to lead to toxicity in individuals who are being maintained within the laboratory reference range.*

Professor Ian Reid