Indian J Med Res 136, November 2012, pp 719-721

Editorial

Diabetes prevention - the global hope on the horizon

'Diabetes mellitus is the burden of the 21st century'. Many colleagues, researchers and other stakeholders use this phrase today. **But is this really true?**

Yes, it is true that we are currently experiencing a fast growth of a number of people with diabetes mellitus. This is driven by an exceptional increase of obesity prevalence all over the world, but there are significant differences worldwide. For example in the Gulf States, the prevalence of diabetes mellitus is the highest in the world, except for some isolate population[1]. But also in other regions we experienced a sudden increase in prevalence of diabetes mellitus. For example in Africa there will be a three-fold increase over the next 20 years[1]. This development is attributable to the parallel development of obesity, as obesity is not only related to high income populations but increasingly common also in lower and low income countries[2]. The pathophysiological correlate for this development is the accumulation of visceral obesity, especially in men and later in life also for women. It is also true, that this obesity and consecutive diabetes epidemic generates a significant burden for the healthcare system in its economic, social and medical spectrum. Today, especially the "Minister of Finance" is losing taxpayers money due to the gain in prevalence of type 2 diabetes. Attributable to the much earlier onset of diabetes, the patient is losing healthy working years and the gain in inability generates economic losses and reduces economic growth.

Researchers, physicians and politicians are intensively seeking for a solution for this dilemma, but the whole horizon seems empty, except for a small and tiny ship – diabetes prevention[3]. We will not experience significant impact in improved treatments for patients with diabetes mellitus in the next few years. There will be an impact onto the diabetes burden due to better organisational structures in diabetes care leading to Chronic Care Management, but the most obvious solution one can see at the moment is to invest intensively into strategies and policies supporting the prevention of type 2 diabetes.

The evidence that diabetes is a preventable disease is excellent. Several large randomized clinical trials have shown that more than 50 per cent of diabetes risk can be reduced and diabetes can be postponed and prevented sustainable over more than a decade[4]. Translational studies that tried to translate scientific evidence into clinical practice have proven that similar results are reachable in clinical practice and that it is feasible to implement diabetes prevention programmes in different care processes and structures. But those translational studies have also shown that it is very much dependent on responsibility of healthcare policies and existing care structures how the prevention programme will look like and what is the outcome for the person at risk and the community[5,6]. Over the last few years we have learned a lot about the non-pharmacological interventions and that these are effective in clinical care to prevent diabetes from developing and we have gained knowledge as to what policies need to be developed[7]. Effective strategies to identify people with increased diabetes risk are available. Changing eating habits can be effective in diabetes prevention, but most effective seems to be to "walk the diabetes away"; 10000 steps and more a day prevent diabetes sustainably, but more importantly 1000 additional steps to the normal daily amount of steps - even if much less than 10000 - are as effective as 1000 mg metformin[8].

Now we have to play the ball from the research arena into the political field. Political support is needed to

This editorial is published on the occasion of World Diabetes Day - November 14, 2012.

build up the framework for a successful implementation of diabetes prevention programmes[9]. But finally, we together with all relevant stakeholdes have to build effective and sustainable prevention programmes[3]. This should not be an excuse for researchers not to act. At the European Diabetes Leadership Forum Kofi Annan said: "We have not enough money to do nothing"[10].

The question is how to act?

A number of European and global projects have acted to collate the evidence in diabetes prevention and to develop tools which can be implemented into clinical care by healthcare professionals and a number of other stakeholders worldwide. The IMAGE project has developed a practical toolkit for diabetes prevention[11] together with the curriculum for the training of prevention managers[12] which is applicable to a number of healthcare systems and is currently implemented in countries in Europe, South America and Asia. The National Institute for Health and Clinical Excellence in the UK has developed guidelines for the prevention of prediabetes which already influence care processes in the UK[13]. The Unites States, Finland and Australia are currently developing national diabetes prevention programmes and campaigns and other countries in the world are following[6]. In September 2011, the United Nations have called for action to implement national diabetes prevention programmes - the World Diabetes Day is the right occasion to bundle our actions and to invest our energy, time and expertise in improving the quality of diabetes prevention and care.

But how can we do this?

A current project called Global Diabetes Survey developed a standardised assessment about the national quality of diabetes prevention and care in its policy structure processes and outcome[6]. This project invites 19 different stakeholder groups related to diabetes care. The data will be collected centrally and evaluated in a standardised and comparable manner and then mirrored back to you as participating volunteer of the action. Together with the votes of finally about 20,000 volunteers worldwide, a global map of the quality of diabetes care that is comparing countries with each other, but broken down into regions within countries, will be drawn. This map can be used to benchmark the national quality of diabetes care, but also can be used to feed the information into the political arena to encourage politicians and stakeholders to act to improve the quality of diabetes care. This especially will be effective with the annual follow up of the Global Diabetes Survey and the annual assessment about changes in quality of diabetes care within a country. The politician who recognizes that neighbouring countries provide a better care for people with diabetes will get pressure to act and this is what is needed if you want to build up a national and global coalition for diabetes care. To do nothing is no longer an option and the World Diabetes Day on 14th of November is the right occasion to remember this. Every reader is invited to participate in the Global Diabetes Survey and to register to participate at *www.globaldiabetessurvey.com*. It would be important to start now! At the next World Diabetes Day in 2013 we will present the results of this 1st Global Diabetes Survey data including your voice for diabetes care.

Peter E.H. Schwarz
Department for Prevention &
Care of Diabetes,
Medical Clinic Unit III,
University Clinic Carl Gustav Carus at
Technical University Dresden,
Fetscherstrasse 74, 01307 Dresden
Germany
peter.schwarz@uniklinikum-dresden.de

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