

## **Report on ISN sponsored symposium**

**Title: Dopamine Systems and Related Behavior (Workshop-C)**

**Date & time:** May 9, 2013, 12:15 pm – 2:15 pm

**Applicant: Dr. Wael Mohamed**

**Place:** Palestine Helnan Hotel, Hall “B”

**Co-Chairs: Dr. Yasser El-Wazir & Dr. Wael Mohamed**

**Abstract:** Dopamine (DA) is a catecholamine neurotransmitter in the mammalian brain that is involved in such functions as locomotion, cognition, attention, affect and neuro-endocrine secretion (Dunnett et al., 2005; Nieoullon, 2002). Its effects are mediated by at least five distinct DA receptor subtypes (D1-D5) (Missale et al., 1998). Dysregulation of dopaminergic transmission predisposes the organism to a number of disorders including Parkinson’s disease, schizophrenia, attention deficit/hyperkinetic disorder (ADHD), affective disorders and drug use/misuse. Furthermore, many drugs that are used to treat these disorders are believed to work through their effects in central dopamine systems. Dopamine, like other monoamines, is removed from the synapse by diffusion and about 70% of the extracellular DA is removed from the synaptic space through the dopamine transporter. DA is co-localized with iron in the brain and to date is the most thoroughly studied of all neurotransmitters relative to iron status (Beard et al., 1993a). The role of iron in dopamine neurobiology is the subject of study by several groups

### **Significance of topic and expected impact of workshop on research field:**

Dopamine is an instrumental neurotransmitter in the central nervous system. It is involved in many neurological function e.g. control of motor function, control of mood. Dopaminergic neurons are mainly present in the mid-brain where they constitute the mesencephalic dopaminergic system. The number of articles role and modulation of function of dopamine in the CNS is increasing rapidly over the last years, which reflect the importance of updating the young neuroscientists about the recent advances in this topic. This workshop will provide the essential updates to the audience in order to keep them abreast of the new achievements in this area and help them put some joint research plans. It will also be an opportunity to inform the participants of the activities of the ISN and benefits of membership.

**Schedule:**

<b>Time</b>	<b>Speaker/Affiliations</b>	<b>Lecture Title</b>
12:15 pm – 12:25 pm	Dr. Yasser El Wazir, Ph.D. Dr. Wael Mohamed, M.D., Ph.D.	Welcome & Introduction
12:25 pm – 12:45 pm	Dr. Amadi O. Ihunwo, Ph.D.  Talk canceled due to inability of the speaker to come because of visa delay	“ISN Funding Opportunities for Neuroscientists”
		Neuroanatomy of Dopaminergic Neurons
12:45 pm – 1:05 pm	Dr. Yasser El Wazir, Ph.D.	Neurophysiology of Dopaminergic Transmission
1:05 pm – 1:25 pm	Dr. Manfred Gerlach, Ph.D.	Neurobiology of ADHD: Focus on the dopaminergic system
1:25 pm – 1:45 pm	Dr. Magda Fahmy, MD	Dopamine related psychiatric disorders
1:45 pm – 2:05 pm	Dr. Wael Mohamed, MD, PhD	New opportunities for improved treatment of dopamine-related disorders
2:05 pm – 2:15 pm	Q & A  Closing Remarks	

Attendants: around 30 physicians working in various hospitals in Egypt (list of some of them is attached)

## **Outcomes**

- Elaboration on the role of dopamine in psychiatric disorders to around 30 physicians working in psychiatric departments in Egyptian hospitals.
- Illustrating how basic science in neurochemistry is essential for understanding clinical problems and therapeutic interventions.
- Publicizing the nature and role of the ISN as a leading international organization in the field of neurology and psychiatry among the congress organizers and the Egyptian psychiatrists. Around 10 physicians have filled in applications to join the ISN
- The symposium was introduced within the scientific program of 9<sup>th</sup> International Congress on Psychiatry and 4<sup>th</sup> International Congress on Neuroscience with the main theme of “The Changing Landscape in the Management of Neuropsychiatric Disorders”. Many psychiatrists, neurologists and neuroscientists attended the conference, which was a privilege to our symposium. Furthermore we distributed the ISN brochures and their logo to many conference attendants to outreach them and spread the word.

## **Difficulties**

Prof. Amadi was not able to come because he had an unexpected delay in obtaining the visa for reasons that were unclear to him or to the symposium organizers. Probably the reason for this long delay is that he was applying to get the visa from his country of residence (South Africa) rather than from his country of nationality (Nigeria). Another reason is that Prof. Amadi had to travel out of SA and take his passport from the Egyptian embassy during the period of visa processing.

We sent a letter of support from the start that he used for application, then we sent an e-mail directly to the Egyptian consulate, and lastly, we communicated with the Ministry of foreign affair in Cairo, but unfortunately, our efforts were unsuccessful.

In order to deal with the absence of Prof. Amadi, Dr. Wael Mohamed covered the part of his talk dealing with ISN Funding Opportunities for Neuroscientists, and Dr. Yasser El-Wazir started his presentation with a short introduction to the anatomy of the central dopamine pathways.

## **Financial report**

Amount transferred from ISN: 4800 US \$ equivalent to 27650 L.E

### **Expenses:**

Conference registration for 5 (3950L.E each) = 19750 L.E

Extra one night for 4 (800L.E each) = 3200 L.E

Air Ticket for Dr. Manfred Gerlash (Frankfurt-Cairo)= 3200L.E

Local Transport from Cairo international airport to Alexandria and back =  
1500L.E

**Total expenses** =27650 E.P. = **3950\$**

**The remaining amount** = **850 US\$**

N.B.

-The current exchange rate 1\$ = 7 EP

-We could not re-fund of Dr Amadi registration fees