DENTISTS REGISTRATION ORDINANCE (Chapter 156)

ORDER MADE BY THE DENTAL COUNCIL OF HONG KONG

It is hereby notified that the Dental Council of Hong Kong ('the Council'), after due inquiry held on 3, 6 July and 13 November 2017 in accordance with section 18 of the Dentists Registration Ordinance, Cap. 156 of the Laws of Hong Kong, found Dr. CHAN Ka-ho, Abraham ('Dr. CHAN') (Registration No. D02958) guilty of the following charges:—

'That you, being a registered dentist, in the period from about February 2008 to September 2011, disregarded your professional responsibility to adequately treat and care for your patient Ms. FONG Mei-yan ('FONG'), or otherwise to have neglected your professional duties to her in that:—

- (a) you failed to perform adequate examination and assessment, and/or failed to make any proper diagnosis on FONG's pain on the upper labial segment (teeth 11, 12, 13 region) before you commenced treatment on her;
- (b) you inappropriately performed multiple procedures on FONG's teeth 12 and 13 including root canal therapy and multiple surgical apicoectomy treatment ('the procedures');
- (c) you failed to take appropriate steps to control FONG's pain in her teeth 12 and 13;
- (d) you failed to offer any appropriate alternative options to FONG before performing the procedures; and/or
- (e) you failed to refer FONG to a specialist of relevant discipline for treatment.

and that in relation to the facts alleged he has been guilty of unprofessional conduct.'

FONG consulted Dr. CHAN on many occasions over a period of more than three years from 2008 to 2011. The following events were relevant to the case in relation to FONG's upper labial segment at teeth 13 to 23 region. On 18 February 2008, FONG told Dr. CHAN that she had crowns of her upper right and left central incisors (teeth 11 and 21) fractured. She said on 16 February 2008, she had her teeth 11 and 21 extracted by a Dr. WU, a dentist in Shatin. She said Dr. WU suggested two dental implants, and had taken a dental impression for the construction of a removable denture. FONG asked Dr. CHAN if dental implants at 11 and 21 were appropriate. FONG also told Dr. CHAN that her tooth 12 was previously root canal treated. FONG also said she was suffering from depression and was consulting a psychiatrist, and was under anti-depressant medications. Dr. CHAN examined FONG's teeth, which showed that she had Class 2 skeletal pattern, deep bite with lower incisors touching palatal mucosa and signs of attrition of the lower anterior teeth. Dr. CHAN wrote in his clinical note that 11 and 21 regions had 'poor wound' and '12-RCT 2 mm short. TTP'. Dr. CHAN discussed the treatment plan with FONG. Dr. CHAN prepared teeth 12, 13, 22 and 23 for the construction of a six unit temporary bridge (13–23). A temporary bridge was placed.

On 3 March 2008, a review was carried out. Wound healing of tooth 11 was said to be fair, but there was pain on palpation on buccal of tooth 11. On 12 March 2008, a review was carried out. Wound healing of tooth 11 was said to be fair and slight pain was noted. On 17 March 2008, another review was carried out. Pain was reported in upper right anterior region. Tooth 12 was found to be tender on percussion. The extraction wounds of teeth 11 and 21 were still inflamed with granulation tissues. OPG was taken and apical pathology of poorly filled tooth 12 was suspected. Dr. CHAN then performed Root Canal Therapy Re-treatment on tooth 12 ('1st RCT Re-treatment of tooth 12').

On 8 April 2008, minor oral surgery for upper anterior region was performed. Standard flap was raised from teeth 13-23. Inflamed granulation tissue in sockets of 11 and 21 were removed for biopsy. On 14 April 2008, histopathology report of the biopsy was received. The result showed that there was chronic inflammatory tissue with moderate fibrosis. On 26 May 2008, the 1st RCT Re-treatment of 12 was completed by obturation. There was no complaint of pain from FONG.

On 14 July 2008, FONG reported increased pain in upper right quadrant after impression taking. Tooth 12 had tenderness on percussion. Dr. CHAN discussed with FONG of apical surgery to tooth 12. Dr. CHAN performed Apicoectomy for tooth 12 ('1st Apicoectomy of tooth 12'). On 21 July 2008, FONG reported pain in upper right quadrant increased for two days.

Intra-oral examination showed tooth 13 had tenderness on percussion, and had response to cold/hot tests. Dr. CHAN diagnosed acute pulpitis of tooth 13. Dr. CHAN performed Root Canal Therapy on tooth 13 ('1st RCT of tooth 13').

On 14 August 2008, the 1st RCT of tooth 13 was completed by obturation. No pain was reported from FONG. Temporary bridge was cemented with Tempo Clear. On 18 September 2008, a review was carried out. Surgical wounds were said to be normal. Dr. CHAN placed fibre post and composite core for tooth 13. There was also cementation of 13–23 bridge.

On 20 May 2010, FONG reported that there was discomfort in upper right quadrant. Periapical radiograph was taken. Surgical exposure for tooth 13 was suggested. On 2 June 2010, Dr. CHAN performed Apicoectomy for tooth 13 ('1st Apicoectomy of tooth 13'). On 28 June 2010, FONG reported that there was discomfort in the upper right quadrant. No abnormality was seen on upper right sulcus and ridge. No inflammation, no abscess, but only surgical scar on buccal mucosa was seen.

On 2 July 2010, FONG reported sharp needle-like pain on upper right teeth, upper right cheek around zygoma and lower eyelid area. Dr. CHAN said he had discussed potential cause of pain was from occlusal stress on bridge; abutment teeth pathology (pulpitis, crack, apical pathology); or Trigeminal Neuralgia. Dr. CHAN's proposed treatments included wearing night-guard on maxillary teeth at night; removal of bridge to check abutment teeth; consult specialist to check and manage Trigeminal Neuralgia. Dr. CHAN referred FONG to consult Dr. Edward HUI, Specialist in Oral and Maxillofacial Surgery, for suspected Trigeminal Neuralgia. On 8 July 2010, Dr. Edward HUI diagnosed the pain was not likely to be Trigeminal Neuralgia, and suggested to investigate further for dental pain. On 26 July 2010, Dr. CHAN took alginate impression for the construction of night-guard, and on 20 August 2010, there was delivery of night-guard.

On 9 September 2010, FONG reported that she could not sleep with night-guard. Dr. CHAN performed second Root Canal Therapy Re-treatment for tooth 12 ('2nd RCT Re-treatment of tooth 12'). On 2 October 2010, FONG reported that pain in upper right quadrant increased in last two days. There was sharp needle-like pain on the upper right teeth, near zygomatic area. Periapical radiographs of teeth 12 and 13 were taken. On 21 October 2010, FONG said there was discomfort at lower right gum and upper. Dr. CHAN planned to have surgery to remove pathology at teeth 12 and 13 apical area. On 26 October 2010, Dr. CHAN performed second Apicoectomy for tooth 12 ('2nd Apioectomy of tooth 12') and second Apicoectomy for tooth 13').

On 16 November 2010, Dr. CHAN took periapical radiographs for teeth 12 and 13. Dr. CHAN suggested removal of bridge 13–23 to check the abutment teeth. On 3 December 2010, Dr. CHAN removed bridge 13–23. Temporary bridge was placed.

On 11 February 2011, FONG told Defendant she would have psychiatric consultation in Tai Po Nethersole Hospital. On 18 March 2011, impression was taken for new temporary bridge 13-23. On 29 March 2011, new temporary bridge was cemented. On 30 May 2011, FONG said only slight discomfort at gum. Slight gingival inflammation around the gum margin of temporary bridge was noted. Dr. CHAN prescribed medication to FONG. One of the medications was Tegretol. On 11 August 2011, FONG told Dr. CHAN that she had consulted government dentist.

On 19 September 2011, FONG told Dr. CHAN that she had visited Dr. MAK Yiu-fai, Specialist in Endodontics. Dr. MAK Yiu-fai had taken 3D CT scan and suggested to have Root Canal Therapy and Apioectomy. Dr. CHAN prescribed medication of Tegretol to FONG. On 22 November 2011, impression was taken for a new temporary bridge. On 25 November 2011, temporary bridge was cemented.

The Council made the following findings:—

Charge (a)

The Council wished to emphasize that before coming up to a proper diagnosis, a dentist should always conduct proper and adequate examination and assessment based on clinical findings and results from special investigations. In situations where there might be a number of differential diagnoses, a dentist should always take proper and adequate steps to come up with a proper diagnosis. Only after a proper diagnosis had been reached should a dentist then commence treatment.

In the handwritten clinical record of Dr. CHAN, and even in Dr. CHAN's subsequently reconstructed clinical record, the Council could only see there was a few record of clinical

diagnosis. It was not until at the inquiry, when asked by the Council, that Dr. CHAN then first told the Council about all his diagnoses of tooth 12 and tooth 13 at different stages of his treatment.

On 17 March 2008, Dr. CHAN performed the 1st RCT Re-treatment on tooth 12, and completed by obturation on 26 May 2008. Dr. CHAN told the Council that after the 1st RCT Re-treatment, the periodontal ligament space of tooth 12 diminished in size. Dr. CHAN said the 1st RCT Re-treatment of tooth 12 was a success. Despite it was a success, Dr. CHAN still later on on 14 July 2008 took the view that there was chronic apical periodontitis at tooth 12 and performed 1st Apiocectomy of tooth 12 on 14 July 2008. Dr. CHAN just based on the report of pain from FONG as the only justification of chronic apical periodontitis. No proper or adequate examination or assessment had been carried out at all.

On 9 September 2010, after Dr. CHAN took out the fibre post for the purpose of performing the 2nd RCT Re-treatment of tooth 12, Dr. CHAN told the Council that he saw there was a crack at tooth 12. However, there was no such record in his handwritten clinical notes.

Even if Dr. CHAN really saw a crack at tooth 12 on 9 September 2010, he should have performed further examination to confirm if it was the crack which caused the pain. There was no evidence at all that Dr. CHAN had carried out any proper and adequate examination and assessment to confirm if there was any crack, and if it was the crack which caused the pain. What Dr. CHAN should have done, but had failed to do so, was to perform a proper radiographic examination of tooth 12 and/or to refer to a specialist in endodontics to confirm if there was a crack, and if it was the crack which caused the pain. Dr. CHAN should not have rushed into performing the 2nd Apicoectomy of tooth 12 on 26 October 2010.

In respect of tooth 13, Dr. CHAN performed the 1st RCT on 21 July 2008. Dr. CHAN removed the six-unit bridge and then performed hot and cold test. Dr. CHAN said tooth 13 reacted to the hot and cold test. Dr. CHAN then came up with the diagnosis that tooth 13 had acute pulpitis. The hot and cold test was the only test performed by Dr. CHAN. The Council stressed that tooth 13 was already prepared as a bridge abutment at the stage Dr. CHAN performed the hot and cold test. The hot and cold test was not appropriate for the diagnosis of acute pulpitis of tooth 13.

Dr. CHAN said he suspected that the pain of FONG was caused by Trigeminal Neuralgia. However, on 8 July 2010, Dr. Edward HUI had already diagnosed that the pain was not likely to be Trigeminal Neuralgia. Dr. CHAN however still insisted to use Tegretol as a diagnostic tool to test if it was Trigeminal Neuralgia on 30 May 2011.

Even subsequently on 4 July 2011 and 19 September 2011, when FONG already did not present any pain, Dr. CHAN still prescribed FONG with Tegretol. There were no clinical symptoms of Trigeminal Neuralgia at all in the handwritten clinical record of Dr. CHAN.

There was never any proper and adequate examination and assessment of Trigeminal Neuralgia. Dr. CHAN only believed it could be Trigeminal Neuralgia. This was not proper and not adequate.

The Council was satisfied that the conduct of Dr. CHAN had seriously fallen below the standard expected amongst registered dentists. It would be regarded as disgraceful and dishonourable by registered dentists of good repute and competency. The Council therefore found Dr. CHAN guilty of charge (a).

Charge (b)

The 1st RCT Re-treatment of tooth 12 started on 17 March 2008 and completed on 26 May 2008. There were no immediate post-operative x-rays available. Dr. CHAN said the digital files had been corrupted. The closest x-ray available to the Council was the x-ray taken on 11 June 2008 ('the 11.6.2008 X-ray'). According to the 11.6.2008 X-ray, it could be seen that for tooth 12, there were some root canal filling materials. However, there were lots of voids in the root filling materials; in other words, they were poorly condensed. Poor density meant the root filling materials were not able to create a hermetic seal to prevent bacteria from the mouth to re-enter the root canal system. Further, the Council could not see there was any significant improvement in obturation. The 1st RCT Re-treatment of tooth 12 was not up to standard.

The 1st Apicoectomy of tooth 12 was performed on 14 July 2008. There was a pre-operative x-ray taken on 14 July 2008 ('the 14.7.2008 Pre-operative X-ray'). According to the 14.7.2008 Pre-operative X-ray, there was no presence of any apical pathology. There was no justification

whatsoever for performing the 1st Apicoectomy of tooth 12. Further, there was no immediate post-operative x-ray available. Dr. CHAN said the digital file had been corrupted. The closest post-operative x-ray available to the Council was the x-ray taken on 28 July 2008 ('the 28.7.2008 X-ray'). According to the 28.7.2008 X-ray, the Council could not see any evidence of radio-opaque retrograde material. Dr. CHAN told the Council that he used DRM composite as retrograde filling material. Dr. CHAN said DRM composite was biocompatible and non-cytotoxic. He said he started using DRM composite after attending a seminar about the properties of this material. When asked by the Council, Dr. CHAN agreed that there was no proven scientific evidence to prove the seal of DRM composite in retrograde filling context, and understood that such use was experimental. Materials commonly used by dentists should have been used.

The 1st RCT of tooth 13 was carried out on 21 July 2008 and completed on 14 August 2008. The Council had no concern with the justification and the quality of this root canal therapy. The 1st Apicoectomy of tooth 13 was performed on 2 June 2010. There were two x-rays taken on 20 May 2010 ('the 20.5.2010 X-rays'). No apical pathology could be seen from the 20.5.2010 X-rays. There was no justification for carrying out the 1st Apicoectomy of tooth 13. The closest post-operative x-ray available was the x-ray taken on 9 September 2010 ('the 9.9.2010 Post-operative X-ray'). According to the 9.9.2010 Post-operative X-ray, the Council could not see any radio-opaque material near the apex of tooth 13. For the same reason given above, the Council considered the use by Dr. CHAN of DRM composite as retrograde filling materials for tooth 13 not appropriate.

The 2nd RCT Re-treatment of tooth 12 was performed on 9 September 2010. Dr. CHAN used 'MTA' as root filling material. X-rays were taken on 9 September 2010, including post-operative x-ray ('the 9.9.2010 X-rays'). According to the 9.9.2010 post-operative X-ray, there was near perforation of the mesial wall of the root. Further, there was no evidence of radio opaque retrograde material in the Apical 1/3 of the root. The 2nd RCT Re-treatment of tooth 12 was not up to standard.

The 2nd Apicoectomy of tooth 12 was performed on 26 October 2010. According to an x-ray taken on 2 October 2010 ('the 2.10.2010 X-ray'), the mid root region of tooth 12 was almost perforated. The tooth was already highly weakened. There was no justification for open surgery to check if there was any apical pathology for tooth 12. Further, there was no immediate post-operative x-ray available. Dr. CHAN said the digital file had been corrupted. According to the closest post-operative x-ray taken on 16 November 2010 ('the 16.11.2010 X-ray'), there was no evidence of radio opaque retrograde filling material in the Apical 1/3 of the root. Again, the Council considered the use by Dr. CHAN of DRM composite as retrograde filling materials for tooth 12 not appropriate.

The 2nd Apicoectomy of tooth 13 was also performed on 26 October 2010. According to the 16.11.2010 Post-operative X-ray ('the 16.11.2010 Post-operative X-ray'), the Council could not see any radio-opaque material near the apex of tooth 13. For the same reason given above, the Council considered the use by Dr. CHAN of DRM composite as retrograde filling materials for tooth 13 not appropriate.

The Council was satisfied that the conduct of Dr. CHAN had seriously fallen below the standard expected amongst registered dentists. It would be regarded as disgraceful and dishonourable by registered dentists of good repute and competency. The Council therefore found Dr. CHAN guilty of charge (b).

Charge (c)

The Council stressed that the appropriate steps to control pain was to establish diagnosis and derive a treatment plan to remove causes and/or prescription of appropriate medication. The Council took note that during the course of multiple appointments, Dr. CHAN had prescribed to FONG various analgesics.

On 8 July 2010, Dr. Edward HUI had already diagnosed that the pain was not likely to be Trigeminal Neuralgia. On 30 May 2011, Dr. CHAN prescribed FONG with Tegretol as a diagnostic tool. However, there were no cardinal symptoms of Trigeminal Neuralgia. Tegretol was not indicated. On 19 September 2011, Dr. CHAN further prescribed FONG with Tegretol although there was no record of symptoms of pain.

Further, it was inappropriate to use Tegretol as a diagnostic tool. Tegretol was known to have a small percentage of suicidal effect induced in patient with depression. Its use would have potential

complications to the patient's psychiatric status. All along, FONG was known to Dr. CHAN to have depression. Dr. CHAN should not have prescribed FONG with Tegretol, particularly when no blood test was taken from FONG.

The Council was satisfied that the conduct of Dr. CHAN had seriously fallen below the standard expected amongst registered dentists. It would be regarded as disgraceful and dishonourable by registered dentists of good repute and competency. The Council therefore found Dr. CHAN guilty of charge (c).

Charge (d)

The Council found that Dr. CHAN had discussed with FONG about dental implants and removable dentures as alternatives. The Council did not find charge (d) proven. The Council found Dr. CHAN not guilty of charge (d).

Charge (e)

There was record that Dr. CHAN had referred FONG to Dr. Edward HUI, a specialist in Oral and Maxillofacial Surgery. The Council did not find charge (e) proven. The Council found Dr. CHAN not guilty of charge (e).

Having regard to the gravity of the case, and bearing in mind the duty of protecting the public and maintaining public confidence in the dental profession, the Council made the following orders:—

- (a) In respect of charge (a), that the name of Dr. CHAN be removed from the General Register for a period of three months;
- (b) In respect of charge (b), that the name of Dr. CHAN be removed from the General Register for a period of three months;
- (c) In respect of charge (c), that the name of Dr. CHAN be removed from the General Register for a period of three months;
- (d) The orders in paragraphs (a), (b) and (c) above be concurrent;
- (e) The operation of the orders as set out in the paragraphs above be suspended and shall not take effect for a period of 12 months;
- (f) During the suspension period of 12 months, Dr. CHAN shall satisfactorily complete a total of 15 hours of continuing dental education in courses of endodontics and/or pain management organized by established dental institutions and to be approved by the Chairman to the Council;
- (g) The order of suspension in paragraph (e) above shall be uplifted if Dr. CHAN is found by the Council to be in breach of the order as set out in paragraph (f) above, or if a finding is made against Dr. CHAN during the said suspension period under section 18(1)(a) to (e) of the Dentists Registration Ordinance, Chapter 156.
- (h) The orders in paragraphs (a) to (g) above shall be published in the Gazette.

In accordance with section 18(5) of the Dentists Registration Ordinance, the orders of the Council shall be published in the Government of Hong Kong Special Administrative Region Gazette. The full judgment of the Council is published in the official website of the Dental Council (http://www.dchk.org.hk).

LEE Kin-man Chairman, Dental Council of Hong Kong