with GD lesion could be explained with the observation that smoking delays GD lesions healing and enhances relapse after healing, affecting adversely the mucosal protective mechanisms.[1] It inhibits mucus secretion, as well as mucosal prostaglandin generation, decreasing mucosal blood flow, inhibiting salivary epidermal growth factor secretion, and inhibiting pancreatic bicarbonate secretion and duodenal mucosal bicarbonate secretion.[1]

Data on whether *H. pylori* contributes to the risk of NSAID-induced GD mucosal injury have been conflicting. Although, the sum of literature reports suggest that *H. pylori* may have a synergistic effect to promote GD lesion in aspirin users[1] our study did not confirm the importance of *H. pylori* in the development of GD lesion in our patients. However, we support the recommendation that *H. pylori* eradication is beneficial in low-dose aspirin consumers with documented peptic ulcer, especially after ulcer bleeding.[1]

Conclusively, our study revealed the occurrence of GD lesions in CAD patients with clinically significant frequency, especially in regard to gastric mucosal lesions. The use of low-dose aspirin was identified as the most important risk factor for GD lesions development. Interestingly, clopidogrel in standard dose (75 mg/d) added to aspirin in dose ≤100 mg/d did not increase risk for GD lesions development. This observation need to be tested for future prospective studies.

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A comparison of the laryngeal mask airway and cuffed oropharyngeal airway during percutaneous dilatational tracheostomy

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Tracheostomy is a standard procedure in critically ill patients requiring mechanical ventilation for prolonged periods, and a percutaneous technique, which has become more widely used, is accepted as an alternative to the surgical approach.[1] In the standard technique of percutaneous dilatational tracheostomy (PDT), the endotracheal tube (ETT) is withdrawn, with the tip of the ETT below, in between, or above the vocal cords. Failure to correctly position the tracheal tube may result in inadvertent puncture of the ETT cuff by the needle or accidental extubation, leading to loss of the airway. In order to decrease the possibility of these complications, the use of a supraglottic airway device such as a laryngeal mask airway (LMA) is suggested during PDT.[2] The cuffed oropharyngeal airway (COPA™; Mallinckrodt Medical, Athlone, Ireland) is a supraglottic airway device consisting of a Guedel shaped airway with a specially designed inflatable high-volume, low-pressure distal cuff, and a proximal 15 mm connector for attachment to the anesthetic breathing system.[3] The COPA is reported to be a reliable airway management in spontaneously breathing or anesthetized patients.[3,4] The use of a fiberoptic bronchoscope (FOB) through the supraglottic devices allows accurate positioning of the catheter into the midline of the trachea, and the visualization of the guidewire running submucosally within the posterior tracheal wall prior to the use of dilator forceps. Also, the COPA may allow fiberoptically guided tracheal intubation via either the oral or nasal route.[5] However, the use of the COPA under fiberoptic visualization to airway control during PDT has not been previously described in the literature. In this study, we aimed to compare the efficiency and safety of the COPA and LMA in airway management during PDT under endoscopic guidance in anesthetized critically ill patients.

This current study was conducted at Uludag University Faculty of Medicine, Bursa, Turkey from December 2003 to January 2005. The PDT was planned in adult patients who need prolonged mechanical ventilatory support in the general intensive care unit (ICU). After Hospital Ethics Committee approval and informed consent from relatives of the patients were obtained, all patients, aged 18-67 years, were randomly assigned to have either the COPA (n=23)

or the LMA (n=24) used for airway management. Exclusion criteria were large goiter, infection and previous surgery at the site of tracheostomy, significant coagulopathy, marked anatomical deformity of the neck, morbid obesity, or requiring peak inspiratory pressure of >25 cmH_2O. Enteral feeding was stopped 6-8 hours before the PDT. Monitoring consisted of an electrocardiography, invasive blood pressure, pulse oximetry, and capnography. Before 5 minutes to PDT, the inspired fraction of oxygen was increased to 1.0. Intravenous propofol, fentanyl, and mivacurium were used as the anesthetic and neuromuscular paralysis. The patient was positioned with the neck extended, and a pillow placed under the shoulders. After nasogastric and oropharyngeal suction, the tracheal tube was removed and replaced with an appropriately sized LMA or COPA and its cuff inflated with air in accordance with the manufacturer's guidelines. The airway device (COPA or LMA) was connected to the adult manual resuscitator and the patients were ventilated manually. After oxygenation and ventilation was determined to be adequate by the end-tidal CO_2 waveform in capnograph and O_2 saturation in pulse oximeter device, the patient's neck was cleaned and draped. The cricoid cartilage was identified, and skin over the space between the first and second tracheal rings was infiltrated with 2% lidocaine. The PDT was performed as described by Griggs[1] with the Portex Percutaneous Tracheostomy kit (Portex Ltd, Kent, UK) under fiberoptic view with FOB (Pentax FB-IO X®; Pentax GmbH, Hamburg, Germany) between the first and second tracheal cartilages. Then the tracheostomy cannula (8 or 9 mm internal diameter) was inserted and its position was confirmed by FOB. Hemodynamic variables were measured before PDT and every one minute during PDT. Airway manipulations such as chin lift and head tilt were used as necessary and recorded. The data were analyzed using the Mann-Whitney U test and chi-square test. The data were summarized as mean ± standard deviation (SD) in the table. Statistical significance was taken as $p<0.05$. There were no significant differences among the groups with respect to age, gender, acute physiology, and chronic health evaluation (APACHE) II score, duration of PDT, and duration of intubation (**Table 1**). The COPA was inserted successfully in 87% of patients and the LMA in 91.7% of patients. We could not maintain a patent airway in 3 (13%) patients in the COPA group, and 2 (8.3%) patients in the LMA group. These patients were successfully reintubated orotracheally, PDT was performed after withdrawing ETT without any critical incidents such as desaturation, hypotension, and hypertension occurring. In laryngoscopic view, edematous epiglottis and larynx was detected. Although in the COPA group, positional maneuvers such as chin lift (47.8%) and chin lift+head tilt (8.7%) was required, in the LMA group no manipulation was needed ($p<0.001$) (**Table 1**). Significant differences in hemodynamic variables between the groups, and complications such as pneumothorax, subcutaneous emphysema, infection of stoma and tear in the tracheal wall were not encountered. There was no procedure-related death. Percutaneous dilatational tracheostomy is a popular technique in critically ill patients in the ICU. It has many advantages such as short procedure time, low patient charge, small incision, which when used results in a minor cosmetic defect, and decreases the risk of wound infection. Airway control is very important during this procedure. The COPA, a supraglottic airway device, has been developed for the upper airway, and it is demonstrated that it provided a clear airway requiring some airway interventions.[3,5] The COPA is used in clinical practice as an alternative to the LMA.[3] Although it was found that the LMA provided an effective method of ventilation, with minimal leak around the cuff in the patients who were not requiring high inflation pressures during PDT,[2] there is no published study regarding the use of COPA. In our study, we used COPA and LMA devices during PDT in ICU patients, and determined adequate airway. However, the COPA group required more external airway manipulations, especially chin lift and head tilt to maintain a clear airway, than the LMA group. The patients were intubated for a long time, and because of this, they developed edematous tissue and more salivation. Therefore, using this device to provide a patent airway required more manipulation. It is generally recommended that the procedure of PDT should be under direct vision using a FOB. The addition of FOB has further increased the safety of this procedure, because it allows all instruments to enter the trachea centrally, and causes no damage to the posterior tracheal wall during the procedure. It may prevent

Table 1 - Demographic and tracheostomy-related data, and incidence of airway interventions.

Variable	COPA Group (n=23)	LMA Group (n=24)
Age (year)*	52.96 ± 17.28	48.83 ± 18.12
Gender (female/male)	6/17	5/19
APACHE II score*	18.91 ± 9.6	15.08 ± 7.17
Duration of intubation (day)*	2.78 ± 6.49	10.66 ± 2.89
Duration of PDT (min)*	4.17 ± 1.11	4.70 ± 1.96
Airway manipulations		
No intervention required†	7 (30.5)	22 (100)
Chin lift†	11 (47.8)	0
Head tilt+chin lift	2 (8.7)	0

*Values are mean ± SD
COPA - cuffed oropharyngeal airway,
LMA - laryngeal mask airway,
APACHE - acute physiology and chronic health evaluation,
PDT - percutaneous dilatational tracheostomy.
† $p<0.001$; all other variables, $p>0.05$.

such complications as pneumothorax, subcutaneous emphysema, and paratracheal false passage. We determined that the use of the LMA or COPA during FOB guided PDT facilitates a good view of the upper trachea and avoids the possibility of accidental extubation or puncture of the tracheal tube cuff. However, it was observed that these patients who required reintubation, had generalized swelling of the supraglottic structures, and edematous larynx in the laryngoscopic view. In these patients, ETT was performed again, and endotracheal tube placement was successful and PDT was completed without any problem in the hemodynamic variables and oxygenation. Airway loss during the changing of the ETT with the COPA or LMA devices for PDT is a limitation of this technique. However, puncture of the tracheal tube cuff by needle, or accidental extubation during PDT may also cause airway loss and gastric aspiration.

In conclusion, using both the LMA and the COPA as an alternative to ETT allows certain identification of the important landmarks within the larynx and trachea and provides an empty trachea during tracheostomy, thus allowing exact positioning of the tracheal puncture. Our study suggested that, although more chin and head manipulations were required to maintain a patent airway, COPA was an equally effective airway device as the LMA in PDT procedure. However, the need for airway manipulation makes COPA a less hand-free device than LMA, and this contributes to the greater acceptance of the LMA. Both devices could be used for airway management during PDT.

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Risk factors associated with esophageal cancer in North of Iran

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Esophageal cancer ranked fourth in digestive system malignancies and constitutes 2% up 5% of all identified ones. One of the main characteristics of this lethal disease is its specific geographical distribution that its reason has remained unclear, yet. For instance, its incidence has been reported to be 3/100,000 in Europe and USA. However, in some parts of central Asia, which is known as esophageal cancer belt including Turkmen Sahra of Iran and China have been reported to be 115/100,000 and 130/100,000.[1] Esophageal cancer in the north east of Iran, (Turkmen Sahra in Golestan Province) were reported 165 and 195/100,000 for females and males, during 1980s. Furthermore, in 1995 the number of registered esophageal cancer cases in Mazanderan province was approximately 115 that denoted 28% of the total of the district and 56% of the whole esophageal cancers of the country. When Golestan in northeast of Mazanderan was announced as a new province in 1996 with the total population of 1,466,289 comprising 710,287 men and 716,001 women, the documented total number of cancer was 465 consisting of 244 males and 221 females. During that time, the registered patients with esophageal cancer were 125, comprised 26.8% of whole cases within newly generated province. However, in 1998 the involved patients were 93 (27.6% of all malignancies). Thus, smoking cigarettes, drinking alcohol, malnourishments, bacterial, fungal, viral agents and inheritance were regarded as some etiologic factors of cancer.[2] In Iran, there were several studies carried out concerning epidemiology of esophageal cancer as nutritional states, state of gene expression of P53 protein, and esophageal cancer. Papillomavirus, Cytomegalovirus and Epstein-Barr virus are the etiologic factors. Furthermore, there was other studies about esophageal cancer conducted by Tehran University of Medical Sciences, and Health Research Institute in Babul and Europe concerning nutrition, hygienic practices, and cultural, economical and environmental factors.[2] World Health Organization (WHO) carried out an estimation on health care and population construction trends as well as considering lifestyle and environmental changes; they found that the involved patients were approximately 50% from the year 2000 and the mortality rate increased (5 to 8 million) annually.