



“This is the first case report in the literature describing the long term prognosis of liver necrosis caused by TPN extravasation in an extremely preterm infant.” Alia and Ali (2014).

Reference:

Alia, R. and Ali, H. (2014) PC.85 2 years follow up of intra-abdominal extravasation of TPN causing liver necrosis in a preterm infant. Archives of Disease in Childhood. Fetal and Neonatal Edition. 99 (Suppl 1), p.A65-7.

Extravasation of TPN causing liver necrosis in a preterm infant <http://ctt.ec/XuM4t+> @ivteam #ivteam

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Abstract:

CASE STUDY: This is the first case report in the literature describing the long term prognosis of liver necrosis caused by TPN extravasation in an extremely preterm infant. A 26 weeks gestation preterm boy was born spontaneously with a birth weight of 1.0 kg. He had a UVC inserted soon after birth and it was used to infuse TPN from day 2. The tip of the UVC was at the junction of the left portal vein. On day 6 of life the baby deteriorated with abdominal distension, renal impairment and abnormal liver function. An ultrasound scan showed moderate ascites and a cystic lesion overlying the liver. Chemical analysis and the physical appearance of the ascetic fluid confirmed TPN leak. The manufacturer confirmed the UVC was

not faulty. However and given the position of the UVC tip on x rays, the possible explanation was of chemical erosion of the liver by TPN with subsequent rupture of the liver capsule and leak inside the peritoneal cavity. Acute rupture of the portal vessels by the tip of UVC was unlikely because of the insidious onset of symptoms over days and lack of clinical signs of acute blood loss. The baby was managed conservatively and he made quick recovery. Regular liver ultrasound scans showed cyst calcification and then regression in size. It disappeared by the age of 2 years. There was no portal hypertension.

CONCLUSION: TPN related liver necrosis can follow the following pattern: cystic changes then calcification and later regression in size and disappearance.

Other intravenous and vascular access resources that may be of interest (External links - IVTEAM has no responsibility for content).

Guide for intravenous chemotherapy and associated vascular access devices from Macmillan.
CancerUK IV chemotherapy information.

