



Energize model 2 do 5



Jezik		Strana
Hrvatski	Uputa za uporabu	2-20
English	Operating Instructions	21-39

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Uputa za uporabu_Energize-range-hr-de-en
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Uputa za uporabu hrvatski

Pohranite pažljivo ovu uputu za uporabu.

Poštovani kupci!

Odmah nakon primitka, provjerite uređaj u pogledu vidljivih oštećenja. Za štete prilikom prijevoza kontaktirajte prijevoznika. Napominjemo da oštećenja koja su nastala uslijed nestručnog rukovanja ili rada nisu pokrivena jamstvom. Za daljnja ili druga potraživanja molimo Vas pogledajte naše uvjete dostave i plaćanja.

Prije uporabe uređaja:

Pročitajte pažljivo ovu uputu.

Upoznajte se sa svim komandama.

Punjenje / dopunjavanje uređaja mora uslijediti samo od ovlaštene servisne službe u okviru pregleda u propisanom roku od tri mjeseca, a isto se ne smije vršiti od strane korisnika.

Pitajte servisno poduzeće koje instalira uređaj, da unese adresu za eventualne popravke, hitne slučajeve itd.

Adresa Vašeg tehničkog servisnog poduzeća:

Naziv:

Mjesto:

Ulica:

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Kontaktna osoba:

Kazalo

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1. Uvod

Naš najveći cilj je proizvodnja kvalitetnog proizvoda. Uređaji su proizvedeni na visokom higijenskom standardu i potpuno u skladu sa odgovarajućim propisima. Kao dokaz, svaki uređaj dobija jedan poseban Cornelius higijenski pečat. Taj pečat se nalazi pored označne pločice. Ako naidete na problem za čije rješenje Vam ne pomažu ove upute, molimo pišite nam ili nas nazovite. Pomoći ćemo Vam rado. Ako nam budete pisali, navedite model i serijski broj uređaja.



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2. Sigurnosni propisi

2.1 Opći sigurnosni propisi

Ovaj uređaj je dizajniran i izgrađen u skladu s najnovijom tehnologijom. Ako Vaš uređaj koristite i održavate primjereno uputama za uporabu, on je pogonski siguran. Molimo pridržavajte se sljedećih mjera predostrožnosti kako biste izbjegli opasnosti i štete:

- Uređaj se može koristiti samo u besprijekornom stanju. Sve promjene koje eventualno mogu utjecati na sigurnost uređaja, strogo su zabranjene. Ako želite nešto više saznati o "sigurnosti", obratite se servisnoj ispostavi.
- Ne smiju biti uklonjeni, izmijenjeni ili stavljeni izvan pogona sigurnosni uređaji (npr. sigurnosni ventili, oprema za zaštitu od preopterećenja itd.). (Opasnost od ozljede ili gubitka života!)
- Osigurajte da samo ovlaštene osobe rade na uređaju i da su operatori osposobljeni. Pazite da neovlaštene osobe ne promijene postavke na uređaju ili zahvataju uređaj.
- Dužni ste provjeriti uređaj najmanje jednom dnevno u pogledu očitih oštećenja i nedostataka. Promjene koje eventualno utječu na sigurnost i funkcije, treba odmah prijaviti najbližem servisnom centru.
- Obratite pažnju da se mogu koristiti samo CORNELIUS originalni rezervni dijelovi i pribor koji smo testirali i odobrili.
- Zamjenu električnih originalnih dijelova mora izvoditi ovlaštena osoba u skladu s BGVA3 i VDE 0701/702.
- Za štete nastale iz uporabe neoriginalnih dijelova ili pribora ili zbog nepravilnog rukovanja, isključena je svaka odgovornost tvrtke IMI Cornelius Deutschland GmbH.
- Ovaj uređaj nije namijenjen za uporabu od strane osoba (uključujući djecu) sa smanjenim fizičkim, osjetilnim ili mentalnim sposobnostima ili nedostatkom iskustva i/ili znanja, osim ako su pod nadzorom osobe zadužene za njihovu sigurnost ili su od nje dobile uputstva kako treba koristiti aparat. Djecu treba nadzirati kako bi se uvjerili da se ne igraju s uređajem.

2.2 Sigurnosne upute struja

Strujni udar može biti smrtonosan ili može izazvati ozbiljne ozljede! Strogo se zabranjuje, dakle, nedopuštena operacija u elektroenergetskom sustavu. Voda i struja stvaraju smrtonosnu mješavinu!

Općenito se preporučuje osigurati rad uređaja sa zaštitnom sklopkom za kvar (FI).

Prije čišćenja u blizini uređaja ili na samom uređaju, izvucite uvijek mrežni utikač. Uređaj je isporučen s lijevanim utikačem sa zaštitnim kontaktom i smije biti spojen samo na uzemljenu utičnicu sa zaštitnim kontaktom.

Ako nema odgovarajuće utičnice sa zaštitnim kontaktom, tada mora biti izvršeno priključivanje samo od ovlaštenog osoblja, pri čemu se treba pridržavati propisa koji važe za mjesto ugradnje.

2.3 Sigurnosne upute CO2

- Postavite CO2-bocu okomito na radnom mjestu i osigurajte je od prevrtanja.
- Zaštite plinsku bocu od topline (npr. kod sunčevog zračenja). Minimalna udaljenost 0,5 m od grijača (TRSK).
- Koristiti samo za CO2 koji je odobren za živežne namirnice.
- CO2 koji istječe, teži je od zraka i može pri većim količinama i u zatvorenim prostorima dovesti do opasnosti od gušenja. Osigurajte dostatnu ventilaciju prostorija i/ili odgovarajuću plinsku alarmnu napravu.
- Imajte na umu da se dijelovi uređaja nalaze pod radnim tlakom.
- Nemojte ukloniti ili demontirati dijelove, koji se nalaze pod radnim tlakom.
- Imajte na umu ASI6.80/6.82 od SU (strukovno udruženje za živežne namirnice i restorane)
- Morate imati upute za rukovanje i zamjenu spremnika za plin.

3. Namjena

Energize SC-hladnjak je predviđen za hlađenje bezalkoholnih pića i njihovih sirovina. Kao medij pogodan za isporuku koristi se CO2, koji je dobar za živežne namirnice. Zabranjeno je hlađenje ostalih pića ili tvari.

Ulazna temperatura vode ne smije prelaziti 24°C za Energize 2 i 32°C (Energize 3 do 5), jer inače može doći do nedopušteno povišenih pritisaka u rashladnom ciklusu.

Razmjena energije iz hladnjaka ka tekućini proizvoda, koja se nalazi u zavojnicama za hlađenje, vrši se kroz vodu bez dodatka aditiva. Drugi mediji kao prenosioci nisu dopušteni.

4. Objašnjenje sustava

4.1 Energetsko smanjenje

Dugoročno hlađenje tekućina zahtijeva djelomice značajne količine energije odnosno električne energije. Da bi se ova potreba za energijom održavala po mogućnosti neznatnom i na taj način zaštitio okoliš i smanjili troškovi, razlikuje Energize-SC hladnjak između isporuke pića i faze mirovanja. U vrijeme sa manjim točenjem pića, na primjer preko noći, radi Energize na način stand-by. Sve mehaničke funkcije svode se na minimum, t.j. potreban kapacitet hlađenja je minimalan i garantira samo održavanje zahtijevane minimalno potrebne temperature (cirkulaciju i kontrolu temperature pitona i vodene kupke). Energize prepoznaje trenutak povlačenja pića i prebacuje na maksimalnu snagu, kako bi odvrnuo potrebnu količinu leda i tako pružio dovoljnu snagu hlađenja za povlačenje pića. Nakon završetka uklanjanja pića, Energize automatski prebacuje natrag u stanje stand-by, čim je spremnik iznova dovoljno ohlađen. Najveća ušteda energije postiže se u kombinaciji Energize s Energize tower. Instaliranjem Energize tower premješta se hlađenje sirovine (sirup) iz hladnjaka u tower. To znači da potrebni spremnik za sirup može biti izravno priključen na izmjenjivač topline. Gubici energije su time smanjeni u pitonu.

4.2 Dijagnoza

Energize ima on-board dijagnostički sustav. Prikupljeni podaci se mogu direktno iščitati na glavnom kontroleru ili preko GPRS modema. Razgovarajte sa Vašom servisnom službom o ovoj temi.

5. Zahtjevi za mjesto postavljanja

5.1 Mjesta postavljanja

Pridržavajte se važećih nacionalnih propisa za mjesta ugradnje i električne priključke. Ventilacija mjesta za ugradnju mora ispuniti ogrjevni učinak uređaja. Nedovoljna ventilacija uređaja dovodi do pregrijavanja i uništavanja uređaja. Pazite da ventilacijski otvori nisu pokriveni. Maksimalna temperatura okoline je 32°C za Energize 2 i 40°C za Energize 3 do 5.

5.2 Električni priključci

Potrebna je uzemljena utičnica sa zaštitnim kontaktom s osiguračem od maks. 16 ampera. Mrežni napon mora ležati unutar sljedećih tolerancija: 230V ~ +/- 10% / 50 Hz (207 - 253 V ~).

6. Instalacija

Uređaj mora biti instaliran od strane obučених servisera. Molimo provjerite je li utičnica za rashlađivač uvijek dostupna. Ako je priključni vod uređaja oštećen, mora ga zamijeniti proizvođač ili slično kvalificirana osoba, kako bi se smanjili rizici.

6.1 Priključak za vodu

Priključak samo za pitku vodu!

Priključite uređaj na dovod s najmanje 10 mm unutarnjeg promjera. Preporučamo korištenje filtera za vodu i regulatora tlaka za ulaz vode. Obratite pozornost na upute proizvođača filtera. Tlak protoka vode mora iznositi najmanje 0,2 MPa (2 bara) - (montirati kontrolni manometar na regulatoru tlaka vode).

6.2 CO2-priključak

Potreban Vam je najmanje jedan odgovarajući 2-struki reduktor tlaka s 0,7 MPa (7 bara). Priključite reduktor na CO2-priključak kroz oplasteni vod s najmanje 4 mm (preporučuje se) unutarnjeg promjera. Postavite CO2-tlak na 0,45-0,6 MPa (4,5-6 bara).

Uređaj ima CO2-tlačnu sklopku, koja na CO2-tlaku ispod 0,45 MPa (4,5 bara) isključuje opskrbu naponom kod slavine. Drugi priključak CO2-opskrbe koristite za prijenos sirovina iz spremnika. Ako se koriste light sirovine, tada mora biti priključen odgovarajući srednji reduktor tlaka 0,15 - 0,2 MPa odn. 1,5 - 2,0 bara.

6.3 Priključak prije i poslije miješanja

6.3.1 Priključak prije i poslije miješanja na Energize hladnjaku

U osnovnoj verziji (bez Energize tower), povezuju se spremnici sa sirovinom putem cijevi ID 8,0 mm (prije miješanja) ili ID 8,0 mm ili 10 mm (poslije miješanja) izravno s priključcima za sirup na hladnjaku (vidi 9.1).

6.3.2 Priključak prije i poslije miješanja Energize tower

Sa priključenim Energize tower povezuju se spremnici sa sirovinom putem cijevi ID 8,0 mm (prije miješanja) ili ID 8,0 mm ili 10 mm (poslije miješanja) izravno s priključcima na tower (vidi 13.1).

6.4 Priključak mineralne vode i negazirane vode

Priključak mineralne vode slijedi na prednjem i povratnom toku cirkulacije mineralne vode na Energize-u. Unutarnji promjer cijevi treba biti 13 mm.

Priključak pitke vode slijedi na izlazu pitke vode na Energize-u. Tlak protoka pitke vode je postavljen na 3,2 bara i može se lokalno po potrebi prilagoditi odgovarajućim zahtjevima regulatora tlaka u Energize-u.

6.5 Opskrba naponom kod slavine za točenje

Energize posjeduje transformator sa 24 volta za opskrbu naponom električnih slavina za točenje u dodatku za točenje. Za opskrbu naponom, slavine za točenje će biti priključene na priključnu letvicu na pregradnom zidu u Energize-u u skladu s važećom strujnom šemom (vidi šemu 13.2).

Ako nema dovoljno CO2-tlaka u spremniku karbonatora, opskrba naponom kod slavina za točenje će biti isključena. Osim toga, žuta svjetlosna dioda (LED) pokazuje optički niski tlak na upravljačkoj jedinici (<4 bara).

Prazno točenje iz spremnika karbonatora će biti spriječeno pravovremenim isključivanjem opskrbe naponom kod slavina za točenje. Opskrba naponom će se automatski ponovno uključiti, nakon što je spremnik karbonatora ponovno napunjen.

Pozor! Kratak spoj u opskrbi naponom dovodi do isključenja transformatora ili oštećenja Energize regulatora.

6.6 Priključak za reguliranje negazirane vode

Za negaziranu vodu mora se postaviti spojni kabel 1x 0,75 mm² po slavini za negaziranu vodu od karbonatora za cirkulaciju hladnjaka do slavine za negaziranu vodu. Putem ovog kabela će biti upravljano upravljačkom elektronikom. Dodatno uz ovaj kabel mora se postaviti još jedan kabel od slavine za negaziranu vodu do upravljača, da bi se zatvorio strujni krug.

Alternativno može kod nekih uređaja navođenje uslijediti putem tlačne sklopke (samo kod odgovarajućih modela). Strujni tlak negazirane vode trebao bi tada biti 3,2 bara, a uklopna vrijednost na tlačnoj sklopki najmanje 4,2 bara. Ako su potrebni drugi strujni tlakovi, treba prilagoditi tlačnu sklopku u skladu s tim. Saznajte više o priključku u odgovarajućoj strujnoj šemi.

7. Puštanje u pogon i stavljanje izvan pogona

7.1 Puštanje u pogon

Prije početka svake operacije obratite pozornost na pravne propise za čišćenje. Očistite prije svakog priključivanja spojke na spremnicima za pića i sirovine. Utaknite spojku na spremnike za pića i sirovine. Imajte na umu boju kodiranja za priključke za CO₂ (siva) i za piće odn. sirovinu (crna). Provjerite CO₂-tlak na reduktoru tlaka. Otvorite zaporni ventil na CO₂-boci i zaporni ventil na reduktoru tlaka. On bi trebao ležati unutar sljedećih smjernica:

Sirovine: 3,5 - 4,5 bara
CO₂ – tlak karbonizacije: 5,2 - 6,2 bara
Light sirovina: 1,5 - 2,0 bara
Mineralna voda: 4,0 - 4,5 bara

Namještanje CO₂-tlaka odvija se okretanjem vijka za podešavanje na reduktoru tlaka.

- Tlak smanjiti suprotno smjeru kazaljke na satu
- Tlak povećati u smjeru kazaljke na satu

Provjerite zatim nepropusnost CO₂-cijevi zatvaranjem ventila na boci. Naznačeni prikaz na reduktoru tlaka ne smije spasti, inače pozovite odmah servisera! Nemojte zatim zaboraviti opet otvoriti ventil na CO₂-boci.

Otvorite dovod vode i provjerite strujni tlak u dovodu vode (preporučeno: 2,0 - 3,0 bara). Namještanje se vrši vijkom za podešavanje na regulatoru tlaka na ulasku vode (ne nalazi se u opsegu isporuke). Pobrinite se da je tlak vode uvijek niži od CO₂-ulaznog tlaka, jer inače ne može biti zajamčena cjelokupna karbonizacija.

Provjerite nepropusnost cijevi za pića i sirovine. To je moguće samo optički. Ako tekućina curi, pozovite servisera.

7.2 Uključivanje uređaja

Spremnik za vodu mora biti popunjen vodom iz vodovoda do prelijevanja. Kapacitet se može naći u tehničkim podacima.

Umetnite utikač hladnjaka u uzemljenu utičnicu s zaštitnim kontaktom. Uređaji za upravljanje banke leda startuju automatski (nakon 3 minute kašnjenja), kada se uređaj napuni vodom, i isključuju automatski kompresor nakon postizanja predviđene veličine banke leda.

Upravljanje ovim uređajima sadrži u pogonu banke leda najkraće vrijeme rada i stanku za rashladnu cirkulaciju. Nakon uključivanja rashladne cirkulacije, vrijeme rada iznosi najmanje 5 minuta, čak i ako prethodno slijedi signal za isključivanje. Nakon isključivanja rashladne cirkulacije, stanica iznosi najmanje 3 minute, čak i ako prethodno slijedi signal za uključivanje. Stanica od 3 minute važi i za puštanje u pogon ili nakon nestanka struje. Ovi uređaji imaju osjetnik za banku leda s tri elektrode.

Crpka karbonatora se automatski uključuje prilikom dostatnog zastoynog tlaka i puni spremnik karbonatora. Crpka karbonatora se isključuje, kada je maksimum elektroda postignut u karbonatoru, ali najkasnije poslije 20 minuta. Duža dospijeća ukazuju na curenje ili isuviše veliko povlačenje. Ponovno pokretanje crpke je tada moguće jedino kroz mrežni reset (kratkim povlačenjem (oko 10 sekundi) mrežnog utikača).

Pozor! Kod Energize 4 (odn. Energize 5) slijedi aktivacija druge crpke karbonatora tek kad se spremnik karbonatora napuni do maksimuma elektrode. Prozračite spremnik karbonatora povlačenjem sigurnosnog ventila oko 2 do 4 sekunde. Optočna crpka kod Energize-a mora biti preključena sklopkom na Energize regulatoru. Kod nedovoljnog tlaka na ulazu vode, optočna crpka radi i dalje i može se preključivati sklopkom za UKLJUČIVANJE - ISKLJUČIVANJE.

Pozor! Optočna crpka ne smije raditi na suho, jer to može dovesti do prestanka rada stroja.

7.3 Funkcijski opis razine karbonatora

Ako je za vrijeme pogona razina u spremniku karbonatora tako daleko ispod minimalne razine, da ne postiže praznu elektrodu, električne slavine za točenje na sastavku za točenje automatski se isključuju ili su povezane s drugom crpkom karbonatora kod Energize 4 (odn. Energize 5). Time se sprječava ulazak CO₂ u cirkulaciju mineralne vode, što dovodi do problema u izdavanju pića.

Električne slavine za točenje će biti tek iznova aktivirane odn. druga crpka karbonatora isključena, kada spremnik karbonatora ponovno bude ispunjen do maksimalnog stanja elektroda i tako bude osigurana opskrba mineralnom vodom.

Pozor! Ova funkcija je aktivna samo ako se koristi prethodno montirani transformator za opskrbu naponom za ventile za točenje u sastavku za točenje, kao što je prikazano u strujnoj šemi.

7.4 Kraj operacije (kraj vremena posluživanja)

Nakon svakog završetka operacije nužno je zatvoriti CO₂-bocu i vodovod! Provjerite da li su cijevi ponovno otvorene prije puštanja u pogon.

7.5 Dnevna inspekcija

- Provjerite da li su otvorene cijevi za CO₂ i vodu.
- Provjerite nepropusnost cijevi za pića i sirovine i spremnik za sirovine. Ako tekućina curi, pozovite servisera.
- Provjerite nepropusnost CO₂-cijevi zatvaranjem ventila kod CO₂-boce. Naznačeni prikaz na reduktoru tlaka ne smije spasti, inače pozovite odmah servisera! Nemojte zatim zaboraviti opet otvoriti ventil kod CO₂-boce.

7.6 Stavljanje izvan pogona (npr. vrijeme dopusta, sezonski rad)

Prilikom dužih perioda mirovanja treba izvesti sljedeće radove:

- Priključite CO₂-bocu, CO₂-zapornu slavinu na reduktor tlaka i vodovod.
- Izvucite mrežni utikač iz utičnice s zaštitnim kontaktom.
- Odvojite spojke od spremnika za pića.
- Predajte uređaj kao i piton za pražnjenje i čišćenje.
- To smije vršiti samo stručno osposobljeno osoblje.

7.7 Uklanjanje otpada i zaštita okoliša

Dugi niz godina rade dizajneri u IMI Corneliusu zajedno s klijentima na proizvodnji uređaja, koji ne sadrži opasne materijale i tako su izrađeni, da se prijeko 95% materijala lako može odvojiti i reciklirati.

Svi uređaji IMI Corneliusa ispunjavaju direktive EZ-e 2002/95EZ, 2002/96/EZ i zahtjeve Zakona o električnoj i elektroničkoj opremi (ElektroZ) od ožujka 2005.

Molimo uklonite ovaj uređaj prijeko tvrtke za recikliranje u Vašem području.

Pozor! Nemojte ga baciti u kontejner za javno prikupljanje osobnih uređaja.

Ako je potrebno, predajte Vaš uređaj besplatno Vašem dobavljaču ili svim servisnim stanicama IMI Corneliusa u Langenfeldu.

8. Upute za osnovno čišćenje i dezinfekciju

8.1 Uputa za osnovno čišćenje

Obratite pozornost na važeće nacionalne propise za čišćenje točionica na mjestu ugradnje.

Prije svakog priključivanja i izmjene vrste pića treba očistiti spojnice i ventile za točenje.

Dijelove koji dolaze u dodir sa zrakom i pićem treba čistiti dnevno, npr. oticanja kod slavina za točenje.

Slijedite upute proizvođača sredstava za čišćenje. Prilikom upotrebe tekućina za čišćenje postoji opasnost od ozljeda kiselinom. Prilikom čišćenja nosite uvijek zaštitne naočale i prikladnu odjeću.

Ovisno o stupnju nečistoće mjesta ugradnje, lamele kondenzatora moraju biti redovito čišćene (oko svaka tri mjeseca). To je najbolje raditi četkom i usisavačem.

Ispunjenost vodenog spremnika mora se redovito kontrolirati i zamijeniti barem jednom godišnje. Naziruće stvaranje algine sluzi može se smanjiti dodavanjem sredstava za dezinfekciju (broj narudžbe 14-9670-000). 150 ml dezinfekcijskog sredstva je dovoljno za 30 litara vode.

Čišćenje uređaja smije obavljati samo stručno osposobljeno osoblje u skladu sa sljedećim preporukama:

Za čišćenje od stručno osposobljenog osoblja	CO2-cijevi	Pića-cijevi	Sirovina-cijevi	Mineralna voda-cijevi
Prije prvog puštanja u pogon		X	X	X
Prije svake izmjene vrste pića		X	X	
Prije i poslije obustave duže od 1 tjedna		X	X	
Svaka 2 tjedna		X		
Svaka 3 mjeseca			X	X
Svakih 12 mjeseci	X			

8.2 Uputa za čišćenje i dezinfekciju prije puštanja u pogon

Da bi se osigurala higijenska kvaliteta sustava, moraju se proizvodne cijevi i vodovodi čistiti i dezinficirati prije puštanja u pogon te u redovitim intervalima (vidi DIN 6650-6). Ova uputa se odnosi na postrojenja poslije miješanja. Za točionice prije miješanja molimo izvedite samo dijelove na stranama o sirovinama.

Pozor ! :



Sredstva za čišćenje su agresivna i mogu izazvati ozljede kiselinom! Prilikom čišćenja treba raditi s odgovarajućom zaštitnom odjećom (rukavice, zaštitne naočale). Obratite posebnu pozornost na slavine za točenje prilikom ispiranja sredstva za čišćenje. Postrojenje treba osigurati sa znakom upozorenja prilikom čišćenja/dezinfekcije, da se ne bi koristilo!

Obratite pozornost na dostatnu osobnu higijenu prilikom čišćenja. Postrojenje mora biti čišćeno na svim spojnicama od mrežne vode/ kutnog ventila.

Napomena -> Vodeni filtar :

U postrojenjima s vodenim filtrom treba ukloniti filtarski uložak prije čišćenja + dezinfekcije i zamijeniti ga s utikačem za punjenje. Nikada nemojte koristiti prazan filtarski uložak za ispiranje sredstva za čišćenje, jer time se ne jamči da je stalna i jedinstvena koncentracija sredstva za čišćenje uvedena u postrojenje. Osim toga, postoji rizik od oštećenja komponenti postrojenja od koncentrata.

Napomena -> Cijevi za negaziranu vodu

Kod postojećeg upravljača negazirane vode treba osigurati, da je cijev negazirane vode također ispunjena sredstvom za čišćenje. Kod cijevi negazirane vode koja se ne koristi, molimo montirajte dodatno na priključku izlaza negazirane vode (priključna ploča je prikazana na uređaju) zapornu slavinu, te čistite i ispirajte ručno ovu cijev. Kod ugradnih dijelova negazirane vode koji nisu u uporabi, preporučljivo je, da bi se izbjegli mrtvi svitci, iste isključiti što je bliže cirkulaciji vode.

Napomena -> Električne POM-slavine, koje se ne mogu ručno otvoriti

Slavine se moraju električki koristiti. Valja napomenuti da se, ovisno o vrsti postrojenja, električne POM-slavine event. isključuju nakon dostizanja prazne elektrode u spremniku karbonatora. Ovdje moraju biti izvučena sva 4 kontakta iz utikača razinske elektrode i premošćena pomoću kablenskog mosta, kako bi se opskrba sa 24V održala ka POM-slavinama.

Napomena -> CO2-tlačna sklopka ili vodena tlačna sklopka u sustavu

Ovisno o vrsti postrojenja, nalazi se CO2-tlačna sklopka ili vodena tlačna sklopka u sustavu, koja u slučaju nestašica plina prekida opskrbu naponom sa 24V ka POM slavinama odn. u slučaju nedostatka vode isključuje crpku karbonatora. Ipak za dalji rad sustava, event. postojeća tlačna sklopka mora biti po potrebi kratko spojena.

Napomena -> POM-slavinski blokovi

Preporučuje se, slavinske priključne blokove odvojeno čistiti i dezinficirati. Konkretno, ovdje moraju biti spomenuti Lancer priključni blokovi s zapornim ventilom, jer se u pukotinama zaporne slavine mogu javiti mikrobi, koji se sa standardnom dezinfekcijom ne mogu dovoljno očistiti.

Prilikom mirovanja postrojenja više od 10 dana, mora se ponoviti čišćenje i dezinfekcija prije sljedećeg puštanja u pogon.

Ako je nakon uspješne dezinfekcije postrojenja potrebno otvoriti priključke na vodovodu / vodenoj cirkulaciji (npr. instalacija novog vodenog filtera), moraju se ovi spojevi prije ponovnog priključenja poprskati odgovarajućim dezinfekcijskim sprejom.

8.2.1 Nanošenje sredstva za čišćenje na strani sirovine (npr. P3 Ansep CIP od Ecolab)

- Isperite cijevi koje su ispunjene sirupom / sirovinom u početku s vodom prijeko slavina za točenje. Ovdje Vas, na primjer, vanjski dispencer vode može potpomoći, kako bi se više sirupa na istoj razini istodobno ispiralo. Slavinu za točenje treba koristiti samo na strani sirupa (ručno).



Pozor! Crpke sirupa na plinski pogon ne smiju biti preopterećene ulaznim tlakom na strani sirovine!

- Zatim spojite dispencer vode sa CO2-plinom i iznesite vodu iz cijevi za sirup pomoću plinskog tlaka. Zatim isključite dovod plina i učinite sustav kroz slavine za točenje bez tlaka.
- Čišćenje spremnika početi sredstvima za čišćenje. Koncentracija: prema podacima proizvođača (npr. kod P3 = 50 ml na 1 litru vode = 5% rastvora P3). Kako bi se osiguralo dobro miješanje, preporučljivo je da ispunite rezervoar najprije koncentratom a potom vodom.
- Priključiti cijevi za sirup na spremnike za čišćenje i cijevi napuniti u potpunosti kroz slavine, dok na svim slavinama vidljivo ne izlazi sredstvo za čišćenje.

8.2.2 Nanošenje sredstva za čišćenje na strani vode (npr. P3 Ansep CIP od Ecolab)

- Priključiti vodovod i dovod CO₂-plina na uređaj i postrojenje učiniti bez tlaka kroz slavine za točenje.
- Crpku karbonatora odvojiti od opskrbe naponom, kako bi se spriječio rad crpke na suho (npr. izvući utikač). Demontirati vodovod ka uređaju.
- Preopteretiti vodovod plinskim tlakom i isprazniti cjelokupno postrojenje. Ovo će osigurati da sredstvo za čišćenje naknadno uvedeno u karbonator ne bude pretjerano razrijeđeno. Osigurati pri tome da se sredstvo za čišćenje toči kroz sve slavine! Tada isključiti opskrbu plinom i postrojenje učiniti bez tlaka.
- Spremnik za čišćenje sa sredstvom za čišćenje priključiti na vodovod i spremnik za čišćenje opteretiti s CO₂-tlakom od oko 3 bara (Pozor! Ukloniti prije toga filter). Ventil za ispuštanje na spremniku karbonatora povući pažljivo, dok malo sredstva za čišćenje ne izađe iz ventila. Spremnik će time biti potpuno poplavljen.



POZOR! Pri tome ne smije nepotrebna količina sredstva za čišćenje dospjeti u spremnik za vodu (opasnost od korozije). Ako je potrebno, zamijenite kasnije vodu u spremniku za vodu. Osigurajte pri tome da se sredstvo za čišćenje toči preko svih slavina!

Vrijeme djelovanja sredstva za čišćenje (na strani vode + sirupa) = najm. 20 min. !!

Uklonite u međuvremenu izljeve i distributer sirupa iz slavine i stavite dijelove također 20 minuta u dezinfekcijsku otopinu.
Za teška zagađenja slavine očistite je mehanički koristeći čistu četku.

8.2.3 Iznošenje sredstva za čišćenje na strani sirovine

- Odvojiti spremnik za čišćenje i iznijeti sredstvo za čišćenje iz cijevi za sirup najprije kroz CO₂ plinski tlak. Tada isključiti sustav opskrbe plinom i slavine za točenje učiniti bez tlaka.
- Priključiti razvodnik vode i iznijeti dovoljno vode prijeko strane sirupa na svakoj slavini za točenje. (Pritisnite ovdje samo stranu sirupa na slavini za točenje). Ako postoji sanitarni vodeni filter, preporuča se vodu izvoditi za ispiranje kroz ovaj filter.
- POZOR! Mora se osigurati da sredstvo za čišćenje nije ostalo u postrojenju (opasnost od ozljeda kiselinom)! Treba dokazati i dokumentirati neprisustvo sredstva za čišćenje pomoću testa s trakom / indikator-papira.
- Spremnik za sirup ponovno priključiti na cijevi za sirup i otvoriti slavine za točenje na strani sirupa, dok se ne uspostavi konstantan protok sirupa.

8.2.4 Iznošenje sredstva za čišćenje na strani vode

- Preopteretiti vodovod hladnjaka plinskim tlakom i isprazniti cjelokupno postrojenje kroz slavine za točenje. Ovo će osigurati da se sredstvo za čišćenje iznese najvećim dijelom.
- Plinski dovod zatvoriti i postrojenje kroz slavine za točenje učiniti bez tlaka.
- Postaviti nov ulazni filter za vodu i priključiti postrojenje na izvorni vodovod (event. prethodno isprati prema proizvođačkim podacima o filteru za vodu). Prilikom korištenja sanitarnih filtera mora se osigurati, da je filter montiran prije ispiranja s vodom. Time se osigurava da postrojenje event. neće biti iznova zagađeno bakterijama dovodom zagađene vode. Poprskajte glavu filtera s dezinfekcijskim sprejom pogodnim za plastiku prije nego što umetnete novi uložak.
- Otvoriti vodovod. Povuci ventil za ispuštanje na spremniku karbonatora, dok samo voda ne izlazi iz ventila. Sredstvo za čišćenje koje postoji u glavi karbonatora će time biti iznijeto.
- Iznova otvoriti opskrbu plinom na spremniku karbonatora i iznova uspostaviti opskrbu naponom na crpki karbonatora.
- Iznijeti dovoljno vode kroz svaku slavinu za točenje, da bi se osiguralo neprisustvo sredstva za čišćenje u postrojenju. Ovisno o vrsti uređaja (gornji točionik / donji točionik) i postrojenja pitona, treba za to event. uzeti veće količine mineralne i negazirane vode.



POZOR! Mora se osigurati da sredstvo za čišćenje nije ostalo u postrojenju (opasnost od ozljeda kiselinom)! Treba dokazati i dokumentirati neprisustvo sredstva za čišćenje pomoću testa s trakom / indikator-papira.

Točite iz svake slavine nekoliko pića, kako bi postrojenje ponovno stavili u pogon.
Čišćenje treba dokumentirati.

9. Tehnički podaci

	Energize 2 22-1002-200	Energize 3 22-1001-300	Energize 4 22-1001-400	Energize 5 22-1002-500	Energize5 dualan 22-1002-501
Izlazni kapacitet prema stopi točenja od X pića za 0,3 litre u minuti **	160 kod 2/min	400 kod 2/min	430 kod 4/min	950 kod 4/min	950 kod 4/min
Težina banke leda u kg	11	20	30	60	60
Kapacitet banke leda u kcal	880	1600	2400	4800	4800
Izgradnja leda u min. bez pitona	132	125	218	250	250
Priključni napon	230V / 50Hz	230V / 50Hz	230V / 50Hz	230V / 50Hz	230V / 50Hz
Potrošnja energije u vatima	950W (5,5A)	1200W (5,5A)	1700W (9A)	1850W (9A)	2000W (10A)
Učink kompresora u vatima (PS)*	400 (1/3)	800 (2/3)	885 (3/4)	1437 (1)	1437 (1)
Rashladno sredstvo R134 a u kg	0,240	0,420	0,490	0,800	0,800
Učink crpke karbonatora u litrima/satu	280	280	2 X 280	2 X 280	2 X 280
Učink optočne crpke u litrima/satu	120	320	320	320	2 X 320
Rashladni učinak/učink banke leda u vatima	400	768	825	1160	1160
u kcal/h	464	660	709	1000	1000
Emisija topline u vatima	950	1670	2200	2900	2900
Emisija količine zraka u m ³ /h	290	570	900	1300	1300
Broj rashladnih zavojnica					
Sirup (opcionalno)	6 (standardan)	6	8	8	8
Prije miješanja (opcionalno)	1	2	2	2	2
Negazirana voda (opcionalno)	1	1	1	1	1
Dimenzije u mm					
Visina	635	605	660	810	810
Širina	620	850	950	1080	1080
Dubina	410	470	515	690	690
Otpremna težina u kg	55	80	110	115	115

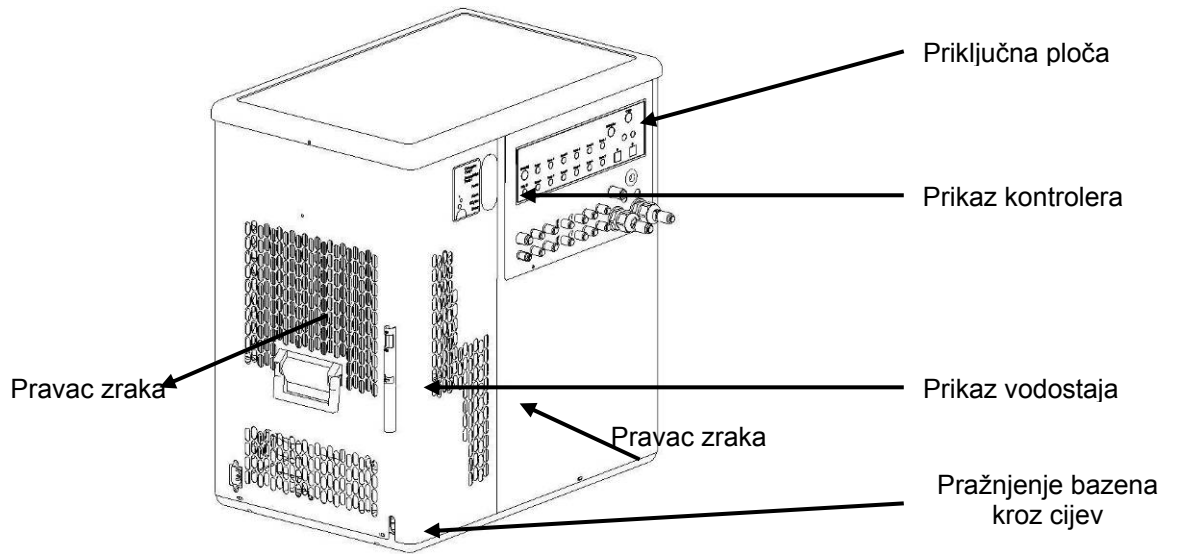
* na -10°C temperaturi isparavanja.

** s 15m pitonom (Energize 2,3,4) i 30m pitonom (Energize 5). Kondicioni test s Energize pitonom i tower s izmjenjivačem topline.

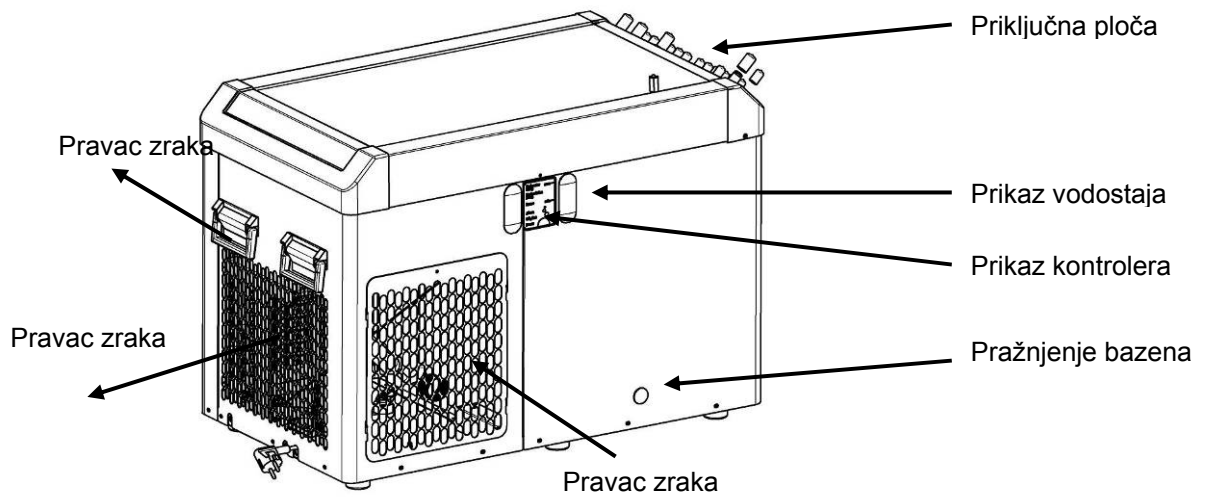
Rashladni učinak i izlazni kapacitet na 32°C temperature okoline i temperature vode ili ulazne temperature sirupa od 32°C i izlazne temperature pića ispod 5°C.

Podložno izmjenama

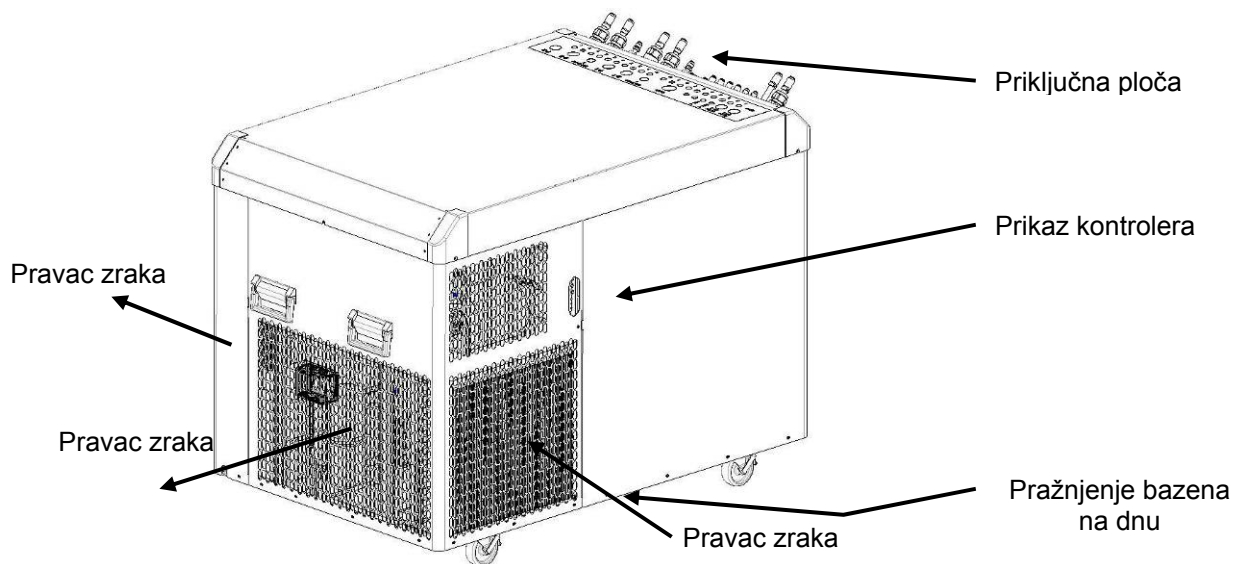
10. Slikovni prikaz
Energize 2



Energize 3 i Energize 4

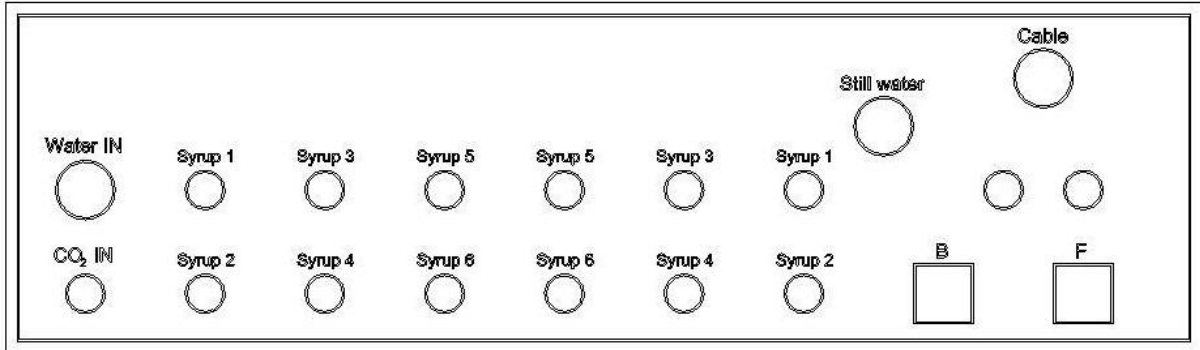


Energize 5

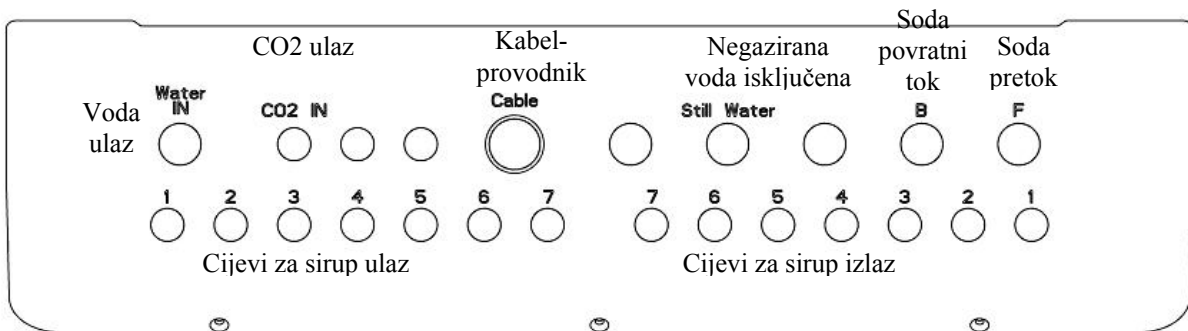


10.1 Priklučci na uređaju

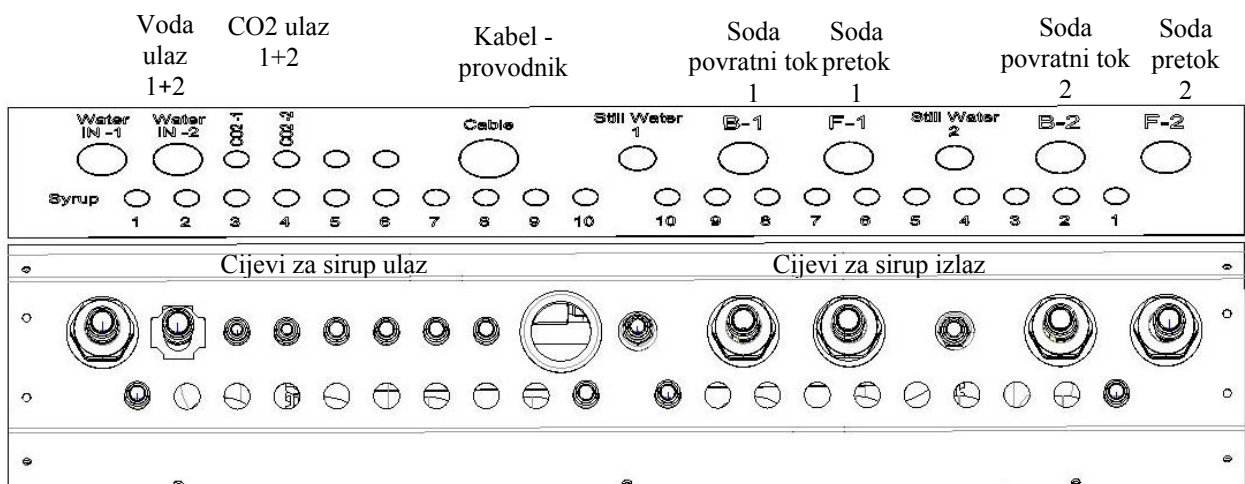
Energize 2 se isporučuje s rashladnim zavojnicama za sirup



Energize 3 i Energize 4 imaju opcionalno rashladne zavojnice za sirup



Energize 5 ima opcionalno rashladne zavojnice za sirup



11. Kvarovi i njihovo uklanjanje

Prije nego što tražite greške u postrojenju točionice, molimo najprije provjerite:

Da li je isključeno napajanje uređaja na struju?

Da li je prekinuta opskrba vodom na uređaju?

Da li su spremnici za pića/sirovine prazni?

Da li je CO₂-boca prazna?

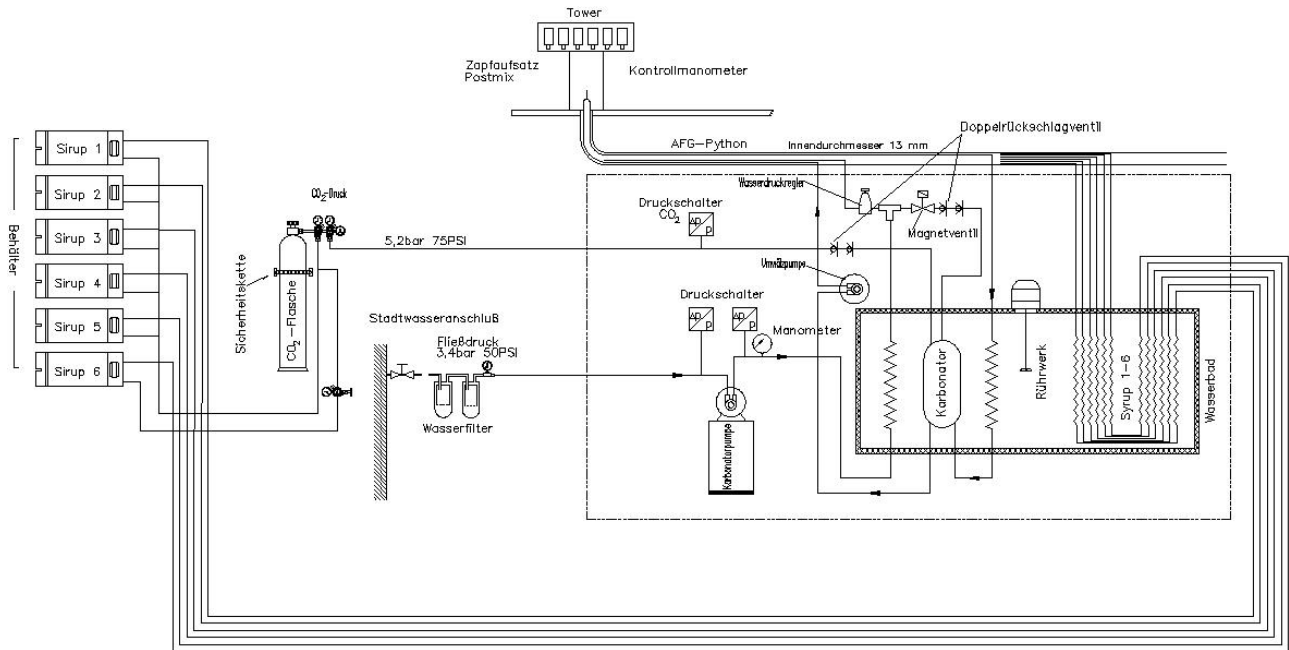
Vrsta kvara	Uzrok	Uklanjanje
Piće je isuviše toplo za vrijeme rada kompresora	Prljavi kondenzator Uzimanje pića je preveliko	Očistiti lamele kondenzatora s četkicom Paziti na kapacitet izdavanja
Piće je isuviše toplo, a kompresor ne radi	Kompresor je neispravan Upravljač je neispravan	Pozvati servisera Pozvati servisera
Piće se pjenu na jednoj slavini za točenje	Sirovina je predugo skladištena i obogaćena s CO ₂	Priključiti spremnik na svježju sirovinu
Piće se pjenu na svim slavinama za točenje	CO ₂ -tlak isuviše veliki Sve sirovine su obogaćene s CO ₂ Sva pića su isuviše topla Nečiste cijevi	Podjesiti tlak Priključiti spremnik na svježju sirovinu Provjeriti temperaturu skladišta Očistiti cijevi
Premali CO ₂ -volumen u piću	Zrak u kotlu karbonatora Uzimanje pića je preveliko CO ₂ -boca je prazna Zaporni ventil na CO ₂ -boci je zatvoren Zaporni ventil na reduktoru tlaka je zatvoren Preniski CO ₂ -tlak Temperatura mineralne vode je previsoka	Prozračiti (samo od servisera) Paziti na kapacitet izdavanja Izmijeniti CO ₂ -bocu Otvoriti zaporni ventil Otvoriti zaporni ventil Podjesiti tlak Ponovno dati da se izgradi banka leda odn. još rashladi spremnik za vodu
Premalo ili previše sirovina u piću	Pritegnut regulator u slavini za točenje Preniski tlak za vađenje sirovine	Pozvati servisera Podjesiti CO ₂ -tlak
Slavina za točenje izdaje samo još sirovinu Pozor! Moguće samo kod mehaničkih slavina	Vodovod je blokiran Crpka karbonatora ne radi	Provjeriti da li je vodovod otvoren Provjeriti protočni tlak vode od 2 bara Kontrolirati da li motor karbonatora radi, inače pozvati servisera

12. Poruke dijagnoza

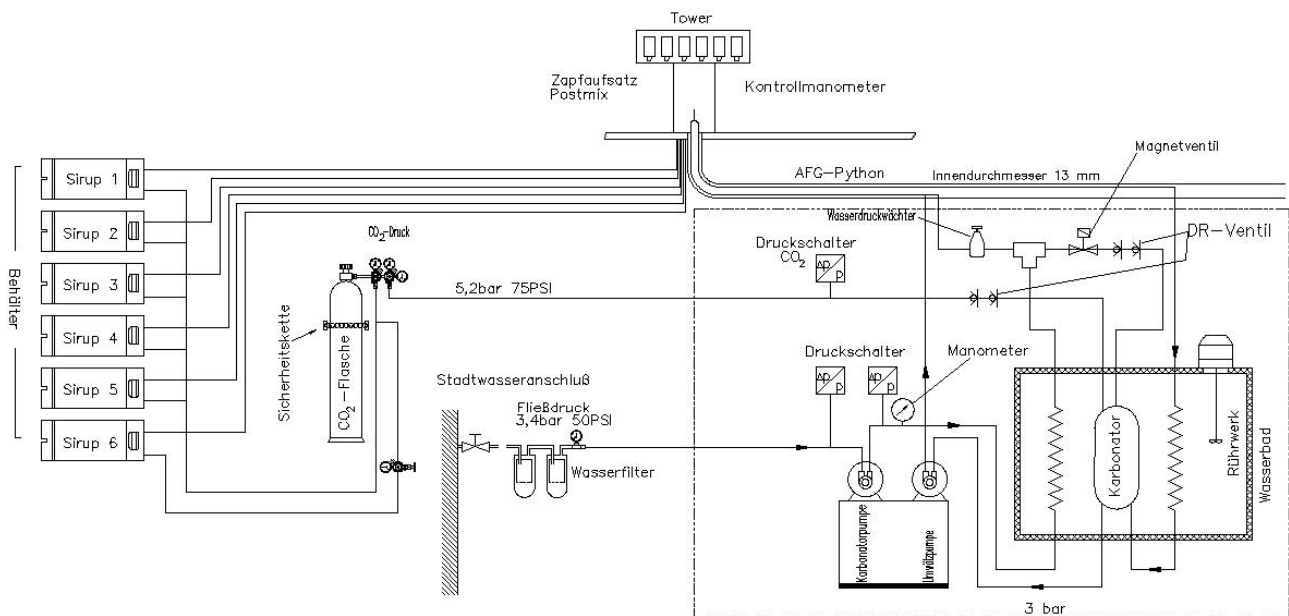
Poruka	Uzrok	Uklanjanje
CO ₂ -tlak NOK	CO ₂ -ulazni tlak je ispod potrebnog ulaznog tlaka.	Provjeriti CO ₂ -opskrbu CO ₂ -bocu promijeniti Namjestiti regulator tlaka Provjeriti CO ₂ -tlačnu sklopku Provjeriti spajanje kabelima/utikač
Crpka karbonatora NOK	Tlak crpke karbonatora je ispod potrebnog pogonskog tlaka.	Provjeriti karbonator Osigurati CO ₂ -opskrbu Izmijeniti crpku karbonatora Izmijeniti motor crpke karbonatora Provjeriti tlačnu sklopku karbonatora Provjeriti spajanje kabelima/utikač
Tlak na ulazu vode NOK	Tlak na ulazu vode je ispod ili iznad dozvoljenog pogonskog tlaka	Provjeriti opskrbu vodom Provjeriti spajanje kabelima/utikač
Agitator NOK	Mješalica ne dostiže unaprijed postavljeni broj obrtaja od 1570 min ⁻¹ odn. 3880 min ⁻¹	Provjeriti motor mješalice Provjeriti spajanje kabelima/utikač
Temperatura vodene kupke NOK	Vodena kupka je iznad pogonske temperature, uređaj je u datom slučaju pretočen	Provjeriti osjetnike temperature Provjeriti spajanje kabelima/utikač Ako je pretočen, sačekati ponovnu izgradnju leda odn. smanjiti stopu točenja.
Temperatura okoline NOK	Temperatura okoline je izvan (40°C) specifikacija	Provjeriti osjetnike temperature Provjeriti spajanje kabelima/utikač Osigurati adekvatan dovod i odvod zraka
Temperatura sode NOK	Povratni tok sode je iznad pogonske temperature od maks. 2°C, uređaj je u datom slučaju pretočen	Provjeriti osjetnike temperature Provjeriti spajanje kabelima/utikač Ako je pretočen, sačekati ponovnu izgradnju leda odn. smanjiti stopu točenja.
Temperatura vrelog plina NOK	Kondenzator je iznad maks. pogonske temperature od 120°C	Provjeriti osjetnike temperature Provjeriti spajanje kabelima/utikač Osigurati dobro prozračivanje Očistiti lamele kondenzatora
Vrijeme izvođenja kompresora		Informacija
Vrijeme izvođenja crpke karbonatora		Informacija
Kontrola voltaže NOK	Opskrba naponom je izvan specifikacije	Provjerite i u datom slučaju ponovno uspostavite opskrbu naponom

13. Dijagrami toka i strujne šeme

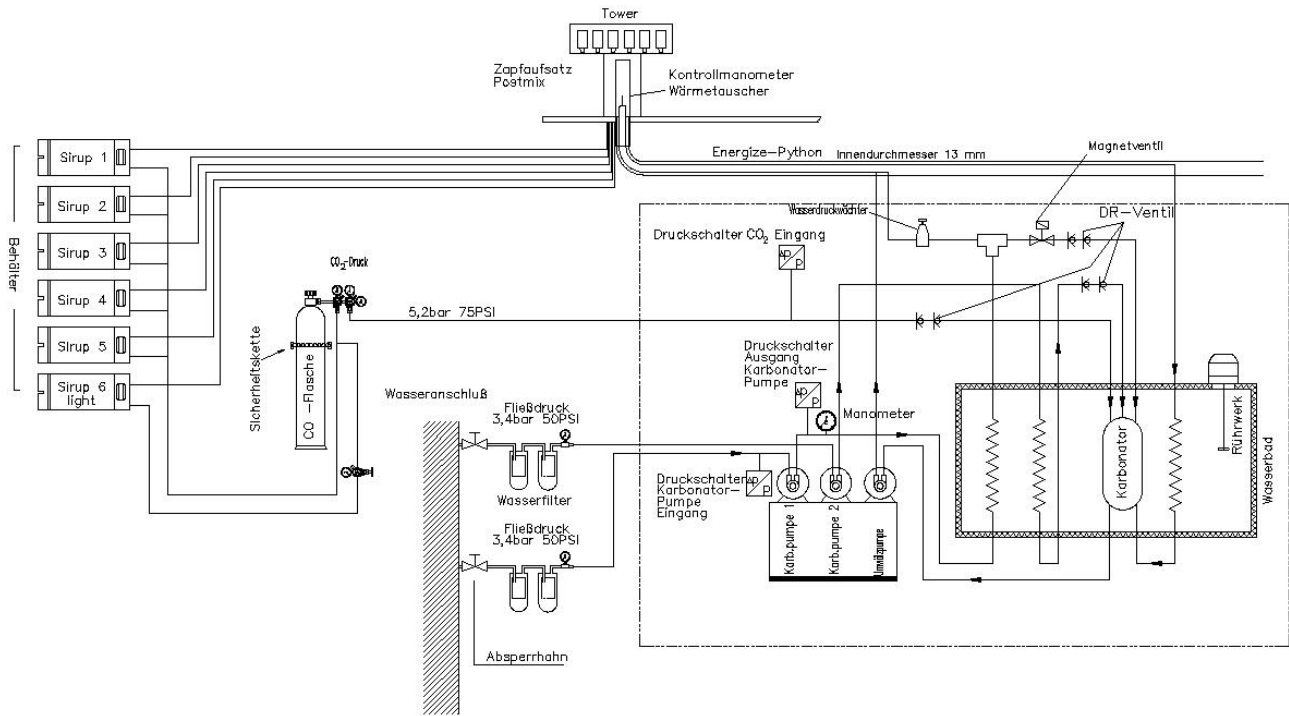
13.1 Dijagram toka 142387170 Energize 2



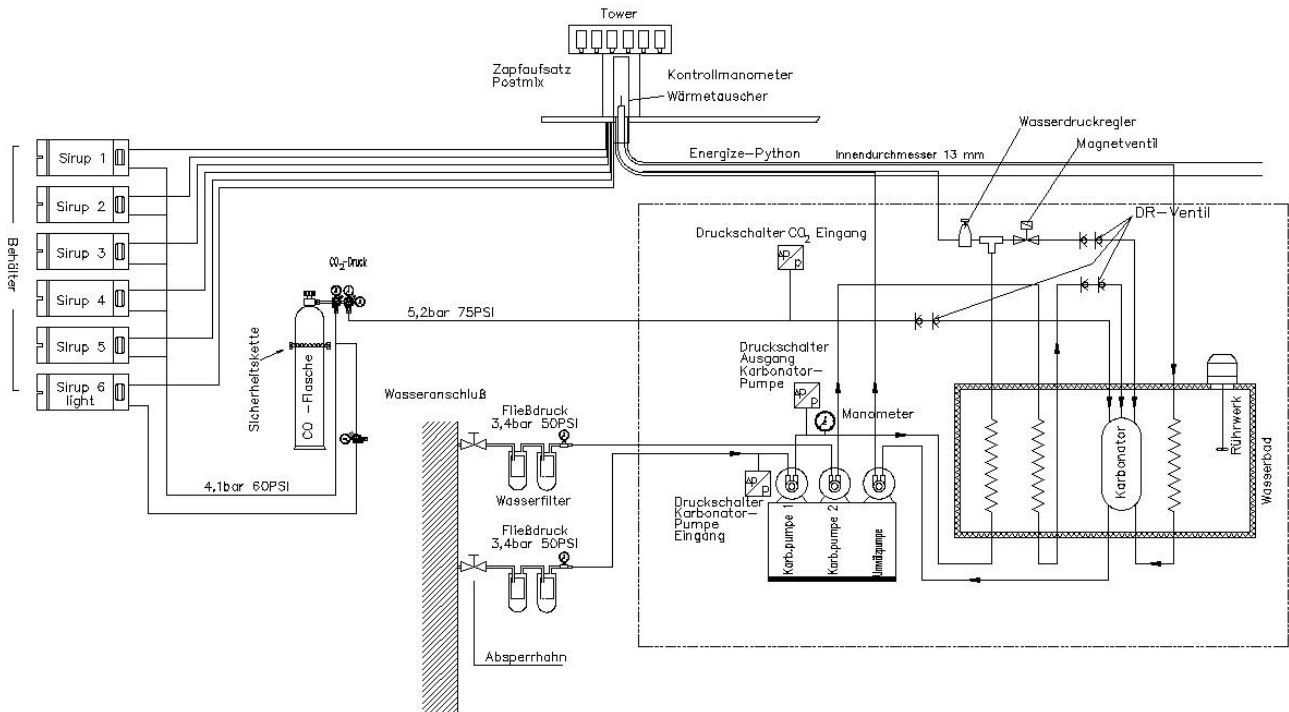
13.2 Dijagram toka 142387157 Energize 3



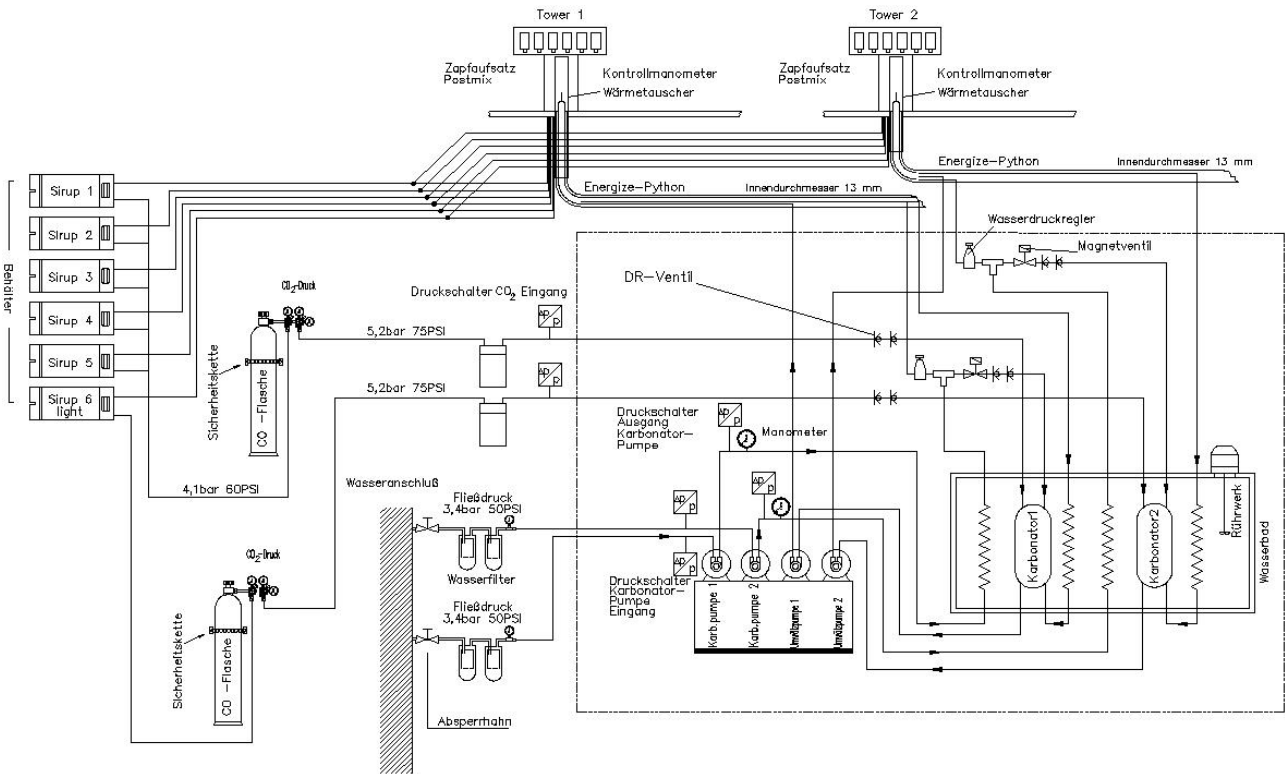
13.3 Dijagram toka 142387164 Energize 4



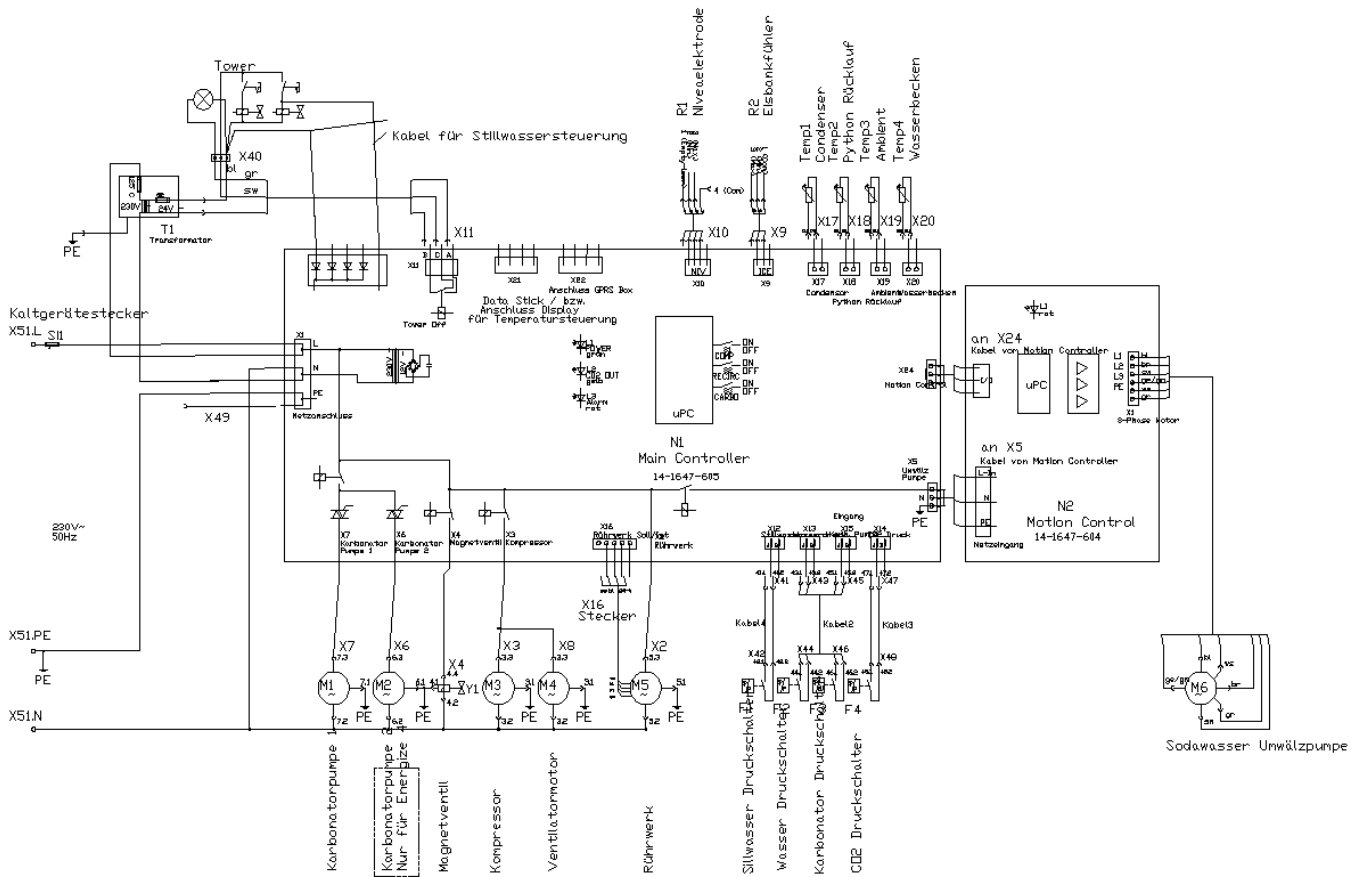
13.4 Dijagram toka 142387167 Energize 5 Jednostavna cirkulacija sode



13.5 Dijagram toka 142387169 Energize 5 Dvostruka cirkulacija sode



13.6 Strujna šema 141660171





Operating instructions English

Please keep these operating instructions in a safe place.

Dear Customer!

Check this product for visible damage immediately upon receipt. Inform the shipper if there is any shipping damage. Note that damage resulting from improper handling or operation is not covered under the warranty. For further claims please refer to our conditions of sale and conditions of payment.

Before putting the device into operation:

Read all the operating instructions carefully.

Familiarize yourself with all controls.

Filling and preparation of the cooler may only be performed by authorized service technicians within the prescribed 3-month review, and not by the operator itself.

Ask the service company installing the device to write its address down here for any subsequent repairs, emergencies, etc.

Address of your technical service company:

Name:

City:

Street:

Telephone:

Contact person:

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1. Introduction

Our foremost aim is to produce a quality product. The units are manufactured on high hygiene standard and correspond in full amount to the relevant standards. Each unit receives a special CORNELIUS hygiene label in proof. This label is beside the nameplate of the unit. If you should encounter any difficulty, which these operating instructions do not help you with, call or write us. We will be glad to be of assistance. If you write, please include the model and serial number of the unit.



Our address:

IMI Cornelius Deutschland GmbH
Carl-Leverkus-Straße 15
40764 Langenfeld
Phone: +49 (0)2173 / 793-0
Fax.: +49 (0)2173 / 77438

2. Safety regulations

2.1 General safety regulations

- This device is of leading-edge design and manufacture. If used and maintained in accordance with these operating instructions, it will be safe to operate. Please comply with the following safety instructions to avoid hazards and damage.
- The device must be in satisfactory condition whenever operated. Any modifications which detrimentally affect the safety of the device are therefore strictly prohibited. Please contact your service company if you wish to obtain more information about safety.
- No safety equipment (such as safety valves, overload protection devices, etc.) is to be removed, modified or put out of commission (risk of injury or death!).
- Take care that only authorized persons work on the device and that the operators are trained. Make certain that no unauthorized persons change the settings on the device or tamper with it.
- The unit is filled by the service technician with water and adjusted to temperature or ice bank mode. The operator must not open the unit.
- You are obligated to check the device on a daily basis for externally discernible damage and defects. Immediately report modifications which affect safety and function to the service company nearest you. Discontinue operation if necessary.
- Note that only original CORNELIUS replacement parts and accessories which have been checked and approved are to be used. IMI Cornelius Deutschland GmbH assumes no liability whatsoever for damage resulting from the use of non-original parts and accessories or from improper handling.
- This device is not determined by persons (including children) with reduced physical, sensory or mental abilities or lack of experience and / or lack of knowledge to be used, unless they are fully supervised by a person who is responsible for their security or received their instructions, as the device is to use. Children should be supervised to ensure that they do not play with the device.

2.2 Safety instructions electricity

- An electric shock may be fatal or result in serious injury. For this reason, any unauthorized tampering is strictly prohibited. Water and electricity are a fatal mixture!
- It is strictly recommended to operate the device with an electrical fault protection switch (FI) only
- Always pull out the mains plug before any cleaning work on or near the device.
- As delivered, it features a moulded earthed-pin plug and it must be connected to a socket outlet with an earthed contact. If no appropriate socket outlet with an earthed contact is available, the connection must be made by authorized persons only, with the regulations applicable at the installation site (EN standards in Germany, for example) being observed.

2.3 Safety instructions CO₂

- Place the carbon dioxide cylinder in an upright position next to the workstation and secure it against falling over.
- Protect it against heat (e.g., against sunshine). Minimum distance from heater 0.5 m (TRSK).
- Escaping carbon dioxide is heavier than air and may present danger of suffocation if large quantities collect in enclosed spaces.
- Use Food suitable CO₂ only
- Remember that parts of the device are at operating pressure. Do not loosen or dismantle any components at operating pressure.

3. Intended use

The Energize soda circuit cooler is designed for cooling non-alcoholic drinks (premix products and their base/syrup). Food suitable CO₂ is used for propellant. The cooling of other drinks or liquids is forbidden.

The inlet temperature of the liquids must not exceed 32°C otherwise the pressure in the refrigeration cycle will rise above specification.

Minimum ambient temperature 10°C, maximum ambient temperature 40°C

The energy exchange from the cooling coil to the drink takes place in a liquid bath with water. No other liquids are endorsed for use in the liquid bath other than water.

The unit is suitable only for fixed installations in a closed area and not for the mobile application. It is prohibited to use the unit in an area, where water jet is possible.

Cleaning with a water jet is forbidden.

4. System explanation

4.1 Energy reduction

Cooling of liquids takes significant amount of energy like electrical power. To keep the need on energy as low as possible in order to save costs and reduce environmental pollution, Energize cooler decides between dispense times and operational readiness. During operational readiness, for example over night, Energize runs in stand by mode. All functions are reduced to a minimum, that means the power input is minimal and supplies just enough energy to keep recirculation at required temperature. Energize recognizes when drinks are dispensed and switches to maximum power to wash required amount of ice to supply enough energy for dispensed drinks. After dispensing, energize switches back to stand by mode automatically. Biggest energy savings resulting in a combination of Energize cooler together with the Energize tower. By using Energize tower all connected product lines are being cooled inside the skeletal tower instead of inside the cooler. The product container are connected directly to the heat exchanger, thereby there are no energy losses in the Python.

4.2 Diagnostic

Energize has an on board diagnostic system. During operation the most important operating parameters are being recorded and stored in main controller of the machine. In case of malfunction or system overload, that could endanger entire machine. It's components or drink quality, the diagnostic system decides whether to indicate a warning or switch off machine or dispense tower. A list containing all messages of the systems is shown in appendix.

4.3 Communication module

The communication module allows Energize to send out an error warning via SMS or a remote read out of operating parameters by using IMIC Diagnostic Software. The communication module allows Energize to send an error warning or fault condition message directly to the cell phone of the responsible field service technician or field service provider. Based on the warning, the next scheduled maintenance inspection can be planned better or being initiated. The error warning describes the kind of faulty condition, which required spares could be prepared for next service. An online check of the machine also allows an evaluation of operating parameters at any time, which gives a realistic overview over the machine, and it's condition. An online check can be done with any computer with installed browser.

4.3.1 IMIC Diagnostic software and field monitoring

The IMIC diagnostic Software allows the Operator to dial into an installed system to request current operating parameters. All parameters are displayed in a concise tabular form and warnings are marked up in “red”. The status of each machine in the field is marked in green or red. Defective machines or error warnings are obvious by the first view. Each call one full set of parameter of each machine is stored in a database and allows further processing. Each machine needs a license to get onto the network. For more than one machine an additional license is required.

4.3.2 IMIC Diagnostic software and machine history

The collected data from field monitoring is stored in a database and allows further data processing of an individual machine or entire field installations. Conclusions of the cooler (or it’s components) usage are possible. It is worth to have a look into machine history data before a service is scheduled.

4.4 Product consumption monitoring

Next to the operating parameters it is possible to collect consumption data of products and total water. A Flow meter device, which is connected to the skeletal tower and Python, is needed to gather this information. The flow meter device recognizes the opening times of each dispense head and calculates the throughput based on the product ratio, provided that product, product ratio and flow rates have been preset correctly during installation. Required values are listed on the installation protocol of the dispense tower. These values need to be adjusted when a product line or one of its components has changed.

5. Installation Requirements

5.1 Installation Sites

Comply with the valid national regulations for installation sites and electrical connections. Ventilation of the installation sites must be appropriate for device output. Inadequate ventilation of the device will result in its overheating and being destroyed. Always make certain that no intake or discharge vents are covered.

5.2 Electrical Connections

A socket outlet with an earthed contact featuring a maximum protection of 16 amperes is required. The line voltage must always be within following tolerances: 230 VAC +6%/-10% / 50 Hz

6. Installation

The device must be installed by a trained service technician. Please take care, that the socket for the unit is always accessible.

There are no user serviceable items inside the equipment.

If the power supply cable to the unit is damaged, it has to be replaced by the manufacturer, the service partner or any other qualified person to avoid safety hazard.

The unit must be planar aligned. Max angle of +/- 2° is permitted.

6.1 Water Connection

Connecting only to drinkable water!

Connect the device to a feed line with an inner diameter of 10 mm. We recommend using a water filter and a water pressure regulator for the water input. To permit flushing of the filter, a t-piece should be mounted downstream of the water pressure regulator. The water flow pressure must be minimum 2 bar (mount control pressure gauge on water pressure regulator).

6.2 CO₂-Connection

You will require minimum a stage-wire pressure regulator with 0,7 Mpa (7 bar). Using tubing with an inner diameter of 4mm, connect the pressure regulator to the carbonator. Set the CO₂-pressure to 0,6 Mpa (6 bar).

The unit includes a CO₂-pressure switch to switch off the dispensing valves at a CO₂-pressure less than 0,4 Mpa (4 bar). The second connector is used for feeding the Syrup container in order to deliver the Syrup to tower. If Light Syrups are being used, a secondary Pressure regulator set to 0,05 Mpa –0,1 Mpa (0.5 bar-1.0 bar) is needed.

6.3

6.4 Connecting Premix and Postmix Syrup

Connect one tube with an inner diameter of 6 mm to each device connection. Connect the tube end to the correct cooling coil inputs of the cooler circuit carbonator.

6.4.1 Connecting Premix and Postmix Syrup to Energize Cooler

As Energize in basic specification (without Energize Tower) the cooler will be connected to the syrup container directly by a tube ID 8.0mm (Premix) or tube ID 6.0mm (Postmix).

6.4.2 Connecting Premix and Postmix Syrup to Energize Tower

With connected Energize Tower the syrup container will be connected directly to the Tower connectors by a tube ID 8.0mm (Premix) or tube ID 6.0mm (Postmix).

6.5 Connecting Soda Water and Still Water

Connect the soda water to the forward and backward fittings at the Energize. The inside diameter of the tubes should be 13 mm.

The still water has to be connected to the still water outlet of the Energize. The flow pressure is adjusted to 0,32 Mpa (3.2 bar). If necessary, it can be adapted to the local requirements.

6.6 Power Supply of the Electric Valves

Energize units are equipped with a transformer (not in basic specification) with 24 Volts for the electric power supply of the valves in the tower.

For the power supply of the valves these are connected to the connecting bus (see wiring diagram) at the Energizes inner panel according to the circuit diagram.

In the case of insufficient CO₂-pressure at the carbonator inlet, the power supply to the valves is switched off. In addition to this a LED on the main controller panel indicates low pressure.

A complete emptying of the carbonator bowl is prevented by switching off the power supply of the valves in time. The power supply is switched on automatically after the carbonator bowl has been refilled.

Caution: A short circuit in the power supply to the valves caused a transformer switch off or a damage of the level board.

6.7 Connection of Still Water Control

For still water, one switching cable (1 x 0.75 mm²) per still water tap must run from the soda circuit carbonator to the still water tap. The electronic control system is actuated via this cable. An additional cable from one of the still water valves is necessary to close the circuit.

Alternatively, there are some units which can be controlled by a pressure switch for the still water. It is recommended to adjust the still water flow pressure to 3.2 bar and the switching point of the pressure switch to minimum 4.2 bar. If a different flow pressure is required the switching point of the pressure switch must be set accordingly. Refer to the circuit diagram for the connection. The flow rate of the still water should be 300 ml each 4seconds.

7. Putting into and out of Service

7.1 Putting into Service

Comply with the cleaning regulations defined by law before beginning each operation.

Clean the couplings on the container for beverage/syrup every time before you attach them.

Connect coupling to container for beverage/syrup.

Note!: Keep attention to colour coded couplings of CO₂ and beverage/syrup.

Check the CO₂-pressure at the pressure regulator. It should be within the following standard values:

Open the cylinder valve on the CO₂-cylinder and the valve on the pressure regulator.

Syrup: 3.5 to 4.0 bar

CO₂-carbonization pressure: 6 bar

Light products: 0.5 to 1.0 bar

Drinking water: 4.0 to 4.5 bar

Set the CO₂-pressure by turning the control screw at the regulator valve.

Clockwise to increase the pressure.

Counter-clockwise to reduce the pressure.

Afterwards check the CO₂-lines for leaks by closing the valve of bottle. The set pressure displayed at the pressure regulator should not drop. If it does, notify the service technician immediately. Do not forget to re-open the CO₂-valve after the check.

Open the water feed line and check the flow pressure in it (minimum value: 2.0 to 3.0 bar). Set it at the control screw on the water pressure regulator (not in scope of delivery).

Check the beverage/syrup lines for leaks. Only a visual inspection is possible. If liquid is leaking, call a service technician.

7.2 Turning on the Unit

The water bath must be filled up to the overflow with tap water. Refer to the technical data for the amount required. To prevent algae from forming in the water, add the disinfectant Molco (PN 14-9670-150). The 150 ml container of disinfectant is sufficient for 30 litres of water.

Insert the mains plug for the cooler into a socket outlet with an earthed contact.

Ice bank controlled units start working after the water bath fills with water and switch off automatically (3 minutes delay) after the ice bank is built up.

The control board of the unit has a time delay for switching on and off the cooling system, when it runs in ice bank mode. After the cooling system is switched on the running time is not less than 5 minutes. Switch off signals will be ignored during this time. After the cooling system is switched off the break time is not less than 3 minutes. Switch on signals will be ignored during this time. The break time of 3 minutes is valid for turning on the device and after a break down of the power supply. These units containing a 3-pin ice bank probe.

When water inlet pressure is within specification, the carbonator pump switches on automatically and fills the carbonator bowl. The carbonator pump switches off when upper fill level is reached or the preset maximum run time of 20 min has been exceeded. Long run periods are signs of leaks or too large extraction. It is then only possible to turn the pump back on by a power network reset (pulling out the mains plug briefly).

Attention! At the Energize FF the second carbonator pump do not start working before the carbonator bowl has been filled to the maximum level one time. Release air from the carbonator container by pulling the safety valve for about 2 to 4 seconds. The circulation pump has to be switch on manual by using the switch at the controller. The circulation pump does runs in any case.

Attention! Dry running of the circuit pump coursed a damage.

7.3 Functional description of carbonator level probe

In the case the carbonator bowl is so emptied that the empty probe is out of water the electric dispensing valves in the tower is switched off or, at the Energize FF, the second carbonator pump is switched on. That prevents CO₂ in the soda water circuit and trouble during dispensing soft drinks.

The dispensing valves are switched back on again, or the second carbonator pump is switched off when the carbonator bowl is filled up to the maximum level.

Attention! The switching off of the dispensing valves works only by using the factory fitted transformer for power supply to the dispensing valve.

7.4 End of Operation (End of dispense–time)

It is imperative that the CO₂-cylinder and water line be turned off each time operation is ended!

7.5 Daily Inspection

- Check whether carbon dioxide and water lines are open.
- Check the beverage/syrup lines for leaks. Only a visual inspection is possible. If liquid escapes, call a service technician.
- Check the CO₂-lines for leaks by closing valve on the CO₂-cylinder. The inlet pressure indicated on the pressure regulator should not drop. If it does, call a service technician immediately.
- Do not forget to re-open the CO₂-cylinder valve afterwards.

7.6 Putting out of Service (Vacation, end of season)

Perform the following steps in case of longer standstill periods:

- Close the CO₂-cylinder, the CO₂-stopcocks on pressure regulators and the water feed line.
- Pull the mains plug out of socket outlet with earthed contact.
- Detach the couplings from beverage containers.
- Have the system emptied and cleaned.
- Only trained specialists are carry out this procedure.

8. Cleaning instructions

8.1 Daily Inspection

Comply with the national regulations for cleaning dispense equipment which are valid at the particular installation site. Clean connection parts and tap fittings in advance whenever making connections or changing the type of beverage. Clean parts coming into contact with air and beverage, the nozzle of the tap for example, on a daily basis.

The risk of serious etching exists when handling liquid cleaners. Always wear safety glasses and appropriate clothing during cleaning jobs. Follow the instructions of the cleaner manufacturer.

The condenser fins must be cleaned at regular intervals which vary according to the amount of dirt on the fins (approximately every three months). This is best done with a brush and a vacuum cleaner.

The level of the water bath must be checked regularly and the contents must be exchanged at least once annually. Algae formation can be reduced by adding disinfectant.

The device is to be cleaned by trained on the basis of the following recommendations:

To be cleaned by specialists only	CO ₂ -Lines	Beverage lines	Syrup lines	Soda lines
Before operation		X	X	X
Before each change		X	X	
Before and after a pause of 1 week		X	X	
Every 2 weeks		X		
Every 3 month			X	X
Every 12 month	X			

8.2 Cleaning and Disinfection Procedure before use

In order to achieve a proper hygienic performance of the dispense equipment, it is crucial to run the initial and recurring sanitization procedure (intervals according to DIN 6650-6) on all product and water lines of the system.

Attention !: Cleaning / sanitizing agents are harmful and may cause severe health injuries ! During the work with any agents make sure to always wear proper clothing (gloves, safety goggles, etc.). Special attention must be taken during the flushing of the agent at the dispense valves. It must be made sure, that no operator uses the dispense equipment during sanitation (e.g. use clear signs on the valves, etc) !



Take care of an adequate behaviour towards hygiene while working on the equipment (e.g. disinfecting hands prior to work, etc) in order to professionally deal with the matter. The unit should be cleaned / sanitized starting as close as possible from the mains water connection (wall outlet), to make sure that also the tubing is being treated.

Remark -> Water filters :

In case the system is equipped with a water filter, the filter cartridge needs to be removed before doing the cleaning / sanitization and replaced by a blind plug that allows bypassing the filter. Do not use any empty service filter cartridges to flush the sanitizing agent into the system, as this will not allow a proper and consistent level of sanitizing agent in the unit.

In addition, the high levels of agent passing through the dispenser when using such cartridges may damage components such as sealing, O-rings, etc. in the dispenser.

Remark -> Carbonator- / Circulation pumps

With units such as Triton, Apexx and Energize the carbonator- and soda circulation pumps must be turned off during the cleaning / sanitization process (otherwise foaming issues will occur).

Remark -> Stillwater lines inside the cooler

In case your equipment has still water lines, it must be made sure that these are also being cleaned / sanitized.

In case your equipment currently does not use Stillwater, the line must be equipped with a stopcock to manually drain sanitizing agent from this tube.

In case the Stillwater line is in general not being used on the cooler, it is recommended to disconnect this line as close as possible from the water cycle and close the water line with a blind plug (this avoids areas within the circuit which might not be sufficiently flushed).

Remark -> Electrical post-mix valves, which can not be manually operated

These type of taps must be operated electrically. When doing this, it needs to be considered that on some dispense equipment the 24V electrical power supply to the valves is cut, when the empty electrode in the carbonator bowl is reached. In that case the empty sensing must be bypassed, by e.g. short circuiting all connectors on the plug of the level probe connection.

Remark -> CO₂- or Water pressure sensors on the dispense equipment

Depending on the type of equipment you may have CO₂- or water pressure sensors installed, which will in case of low CO₂ or low water supply cut the 24V power supply to the valves.

In order to still be able to operate the system during the sanitization process, it is required to short circuit such sensors (make sure to put them back into operation after service).

Remark -> Post-mix valve blocks

It is recommended to clean / sanitize the valve blocks separately. Especially valve blocks with an integrated stop cock (e.g. Lancer block) need special care, as the gap in the stop cock allows bacteria to collect, which might not be sufficiently treated with the sanitizing agent.

In case the dispenser is out of operation (without cooling) for more than 10 days, it is necessary to run the cleaning- and sanitization procedure prior to putting the unit back into operation.

Should it be necessary, to open a once sanitized system again (e.g. to install a new water filter) all opened connections must be disinfected with a sanitization spray prior to reconnecting.

8.2.1 Flushing-in of sanitization agent into syrup side (e.g. P3 Ansep CIP from Ecolab)

- The product lines filled with syrup must first be flushed with water. For this an external water distributor can be used to connect and flush several syrup lines simultaneously. The post-mix valves should be operated on the syrup side only for flushing.
Attention! Gas driven syrup pumps must not see any positive pressures on the incoming side of the pump, as this may damage the pumps.
- Connect the water distributor to the CO₂ supply in order to drive the water out of the syrup lines. This avoids that the sanitizing agent is being diluted in the tubing. Afterwards close the CO₂ gas and depressurize the complete system again.
- Fill your cleaning tank with the cleaning / sanitizing agent according to the mixing ratios given by the manufacturer of the agent. (e.g. when using P3 from ECOLAB -> 50ml for 1 litre water = 5% solution) In order to achieve a proper mixing in the cleaning tank, it is recommended to first fill in the agent and then top-off with clean water.
- Connect the syrup lines to the cleaning tank and dispense cleaning / sanitization agent from every single dispense valve. Make sure that agent leaves from all installed taps.

8.2.2 Flushing-in of sanitization agent into water side (e.g. P3 Ansep CIP from Ecolab)

- Close the water- + the CO₂ supply to the unit and depressurize the system with the taps
- Disconnect the water supply to the unit and cut the power supply to the carbonator pump in order to avoid dry running of the pump (e.g. by pulling the plug of the pump).
- Connect the water line feeding the dispenser to CO₂ gas pressure and drain all water from the tubing of the system. This ensures that the sanitizing agent that is afterwards flushed into the dispenser is not being diluted e.g. in the carbonator bowl. Afterwards close the gas supply again and depressurize the system.
- Connect the cleaning tank to the water inlet of the dispenser and pressurize the tank with approx. 3 bars pressure (Attention ! Remove any water filters before doing this !)
- Pull the safety relieve valve on the carbonator bowl and carefully let some sanitizing agent leave the valve. This ensures, that the carbonator bowl is flooded completely with sanitizing agent all the way to the top.



Attention ! : Avoid that excessive amounts (= >50ml) of agent is being introduced into the water bath, as this will carry the risk of corrosion of metal parts in the water bath. In case larger amounts were spilled, the water in the water bath needs to be replaced.

- Flood the complete dispense system with the cleaning / sanitizing agent by operating the post-mix valves. Ensure, that on all valves clearly visible agent is being drawn.

Effect- / working time for the cleaning / sanitizing agent is min. 20 minutes !!

In the meantime remove the dispense nozzles from the valves and sanitize them manually by putting them for 20 minutes into sanitizing agent. In case it is seen that the nozzles are heavily dirty, clean the nozzles mechanically by using a clean brush and sanitization agent.

8.2.3 Flushing-out of sanitization agent out of syrup side (e.g. P3 Ansep CIP from Ecolab)

- Disconnect the cleaning tank and bring out any remaining sanitizing agent from the syrup lines by using CO₂ gas. Afterwards close the CO₂ supply and depressurize the system via the dispense valves.
- Connect the water distributor and sufficiently flush clean water through the syrup lines (for this please open only the syrup side of the dispense valves). In case a hygiene water filter is being used with the dispenser, it is recommended to use for this flushing the water coming from the hygiene filter.



Attention ! It must be ensured, that no cleaning / sanitizing agent remains in the dispense system after service (risk of health injuries) ! The prove that all agent residues have been removed must be tested with indicator or test papers (contact agent manufacturer) & must be documented

- Connect the syrup containers again to the syrup lines and dispense syrup on the post-mix valves until a consistent flow of syrup occurs again.

8.2.4 Flushing-out of sanitization agent out of water side (e.g. P3 Ansep CIP from Ecolab)

- Pressurize the water line to the cooler with CO₂ pressure and dispense all sanitizing agent from the valves. This makes it easier to flush out any remaining agent from the system.
- Close the gas again and depressurize the unit via the dispense valves.
- Install a new water filter cartridge and reconnect the unit via the filter to the mains water line again (refer to filter manufacturer guidelines in case the filter needs priming prior to use).
- In case a hygiene filter is being used on the dispenser, it must be ensured that the new filter cartridge is inserted prior to flushing the system with water. This ensures that a just sanitized system is not being contaminated again by using poor quality mains water to flush out any remaining sanitizing agent. Spray the filter head and the connecting position of the filter cartridge with an adequate sanitizing spray to avoid any introduction of bacteria again.
- Open the mains water supply. Pull the safety relieve valve on the carbonator bowl until only clean water leaves the valve, to ensure that there are no residues of sanitizing agent left in the head area of the carbonator bowl.
- Open the CO₂ gas supply to the carbonator and reconnect the carbonator pump to the power supply.
- Dispense sufficiently water from the post-mix valves to ensure that no sanitizing agent is left in the system.
- Depending on the unit type (Over counter dispenser / large soda circuit installation with long python runs, etc.) the amount of water that needs to be dispensed may vary.



Attention ! It must be ensured, that no cleaning / sanitizing agent remains in the dispense system after service (risk of health injuries) ! The prove that all agent residues have been removed must be tested with indicator or test papers (contact agent manufacturer) & must be documented

- Dispense from each tap a few beverages to fully put the system back into operation again. The cleaning / sanitization procedure must be documented accordingly and the documentation must remain at the cooler (this may vary depending on local regulations).

9. Technical Data

	Energize 2 22-1002-200	Energize 3 22-1001-300	Energize 4 22-1001-400	Energize 5 22-1002-500	Energize5 Dual 22-1002-501
Dispense capacity at rate of X drinks a minute, 0,3 l each**	160 @ 2/min	400 @ 2/min	430 @ 4/min	950 @ 4/min	950 @ 4/min
Ice bank weight in kg	11	20	30	60	60
Ice bank capacity in kcal	880	1600	2400	4800	4800
Initial pull down time min. without Python	132	125	218	250	250
Supply voltage	230V / 50Hz	230V / 50Hz	230V / 50Hz	230V / 50Hz	230V / 50Hz
Energy consumptions in Watt	950W (5,5A)	1200W (5,5A)	1700W (9A)	1850W (9A)	2000W (10A)
Compressor power in Watt (PS)*	400 (1/3)	800 (2/3)	885 (3/4)	1437 (1)	1437 (1)
Refrigerant R134a in kg	0,240	0,420	0,490	0,800	0,800
Carbonator pump power in litre / h	280	280	2 X 280	2 X 280	2 X 280
Recirculation pump power in litre / h	120	320	320	320	2 X 320
Cooling capacity / Ice bank capacity in Watt	400	768	825	1160	1160
in kcal/h	464	660	709	1000	1000
Heat emission in Watt	950	1670	2200	2900	2900
Air quantity emission in m ³ /h	290	570	900	1300	1300
Cooling coils					
Syrup (optional)	6 (Standard)	6	8	8	8
Premix (optional)	1	2	2	2	2
Still water (optional)	1	1	1	1	1
Outer dimensions in mm					
Height	635	605	660	810	810
Width	620	850	950	1080	1080
Depth	410	470	515	690	690
Dispatch weight in kg	55	80	110	115	115

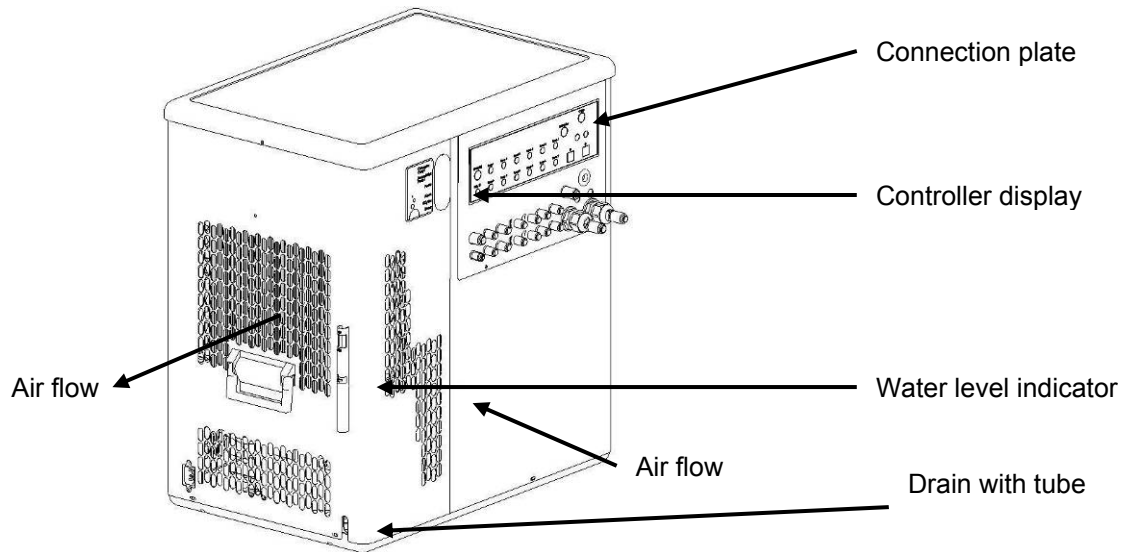
* at -10°C evaporator temperature.

** with 15m python (Energize 2,3,4) and 30m python (Energize 5). Test condition with Energize python and Tower with Heat-Exchanger.

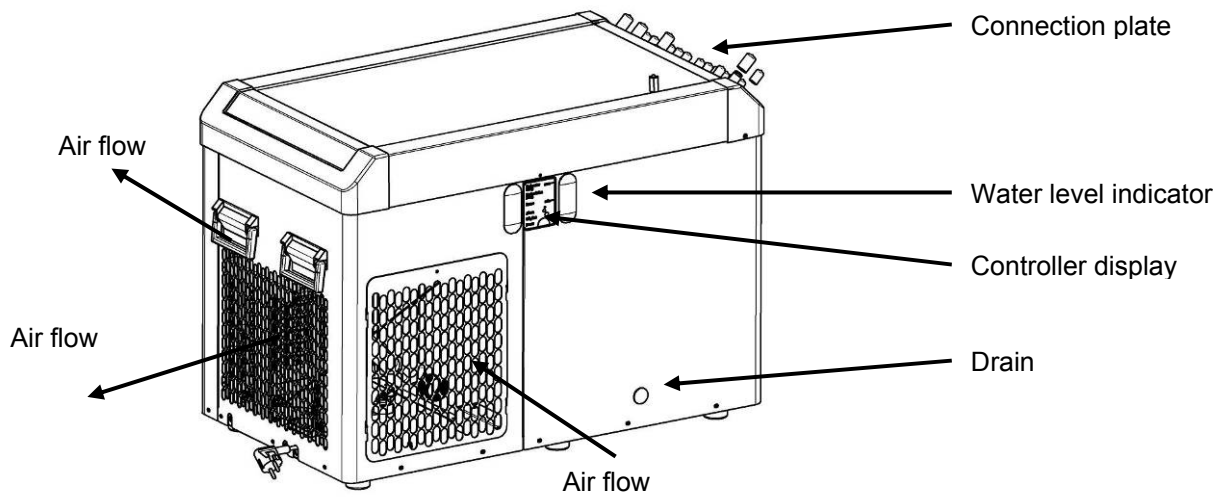
Cooling capacity and dispense capacity at 32°C ambient temperature and 32°C water inlet respectively 32°C Syrup inlet temperature and drink temperatures of less than 5°C.

10. Technical picture

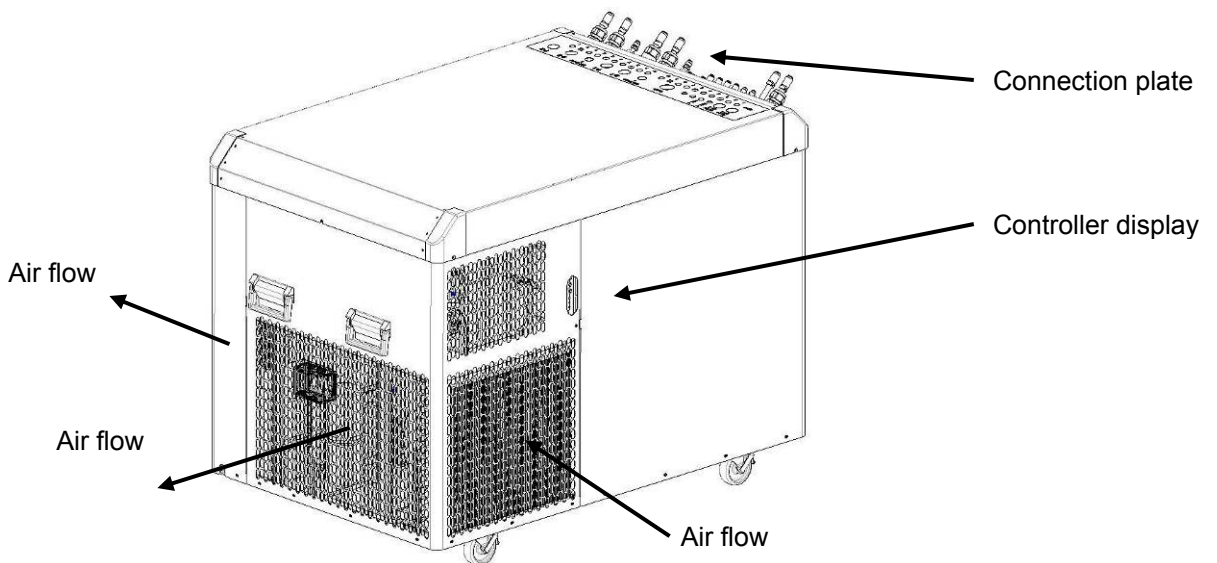
Energize 2



Energize 3 und Energize 4

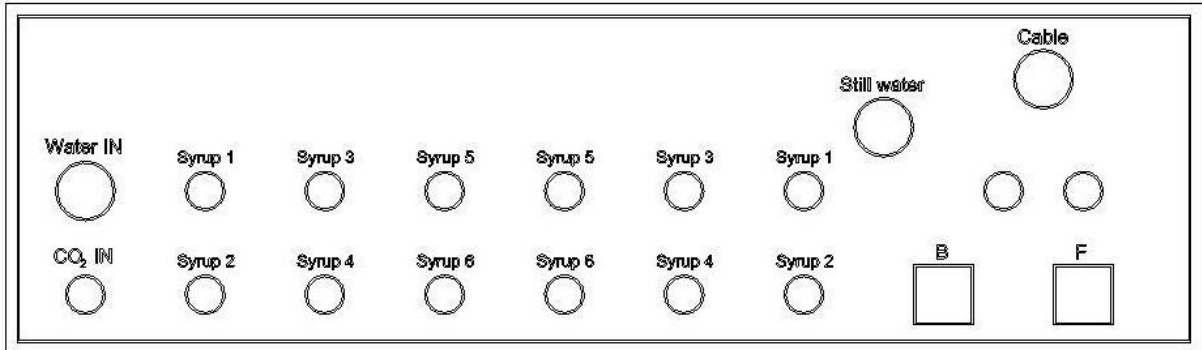


Energize 5

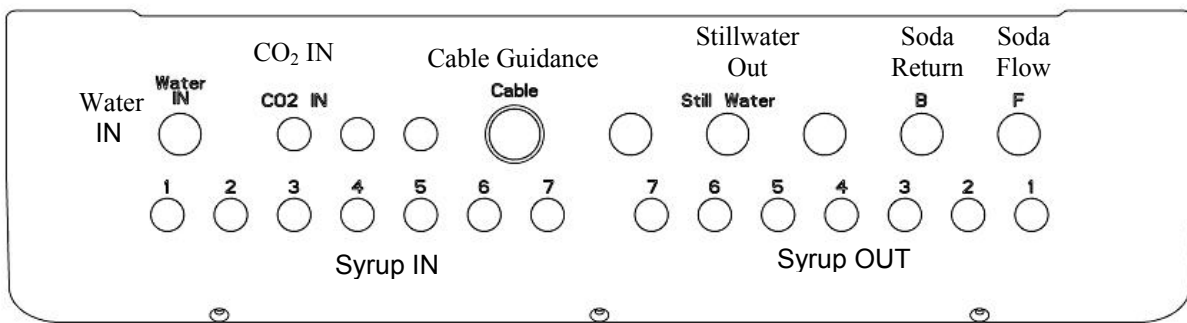


10.1 Connection plate

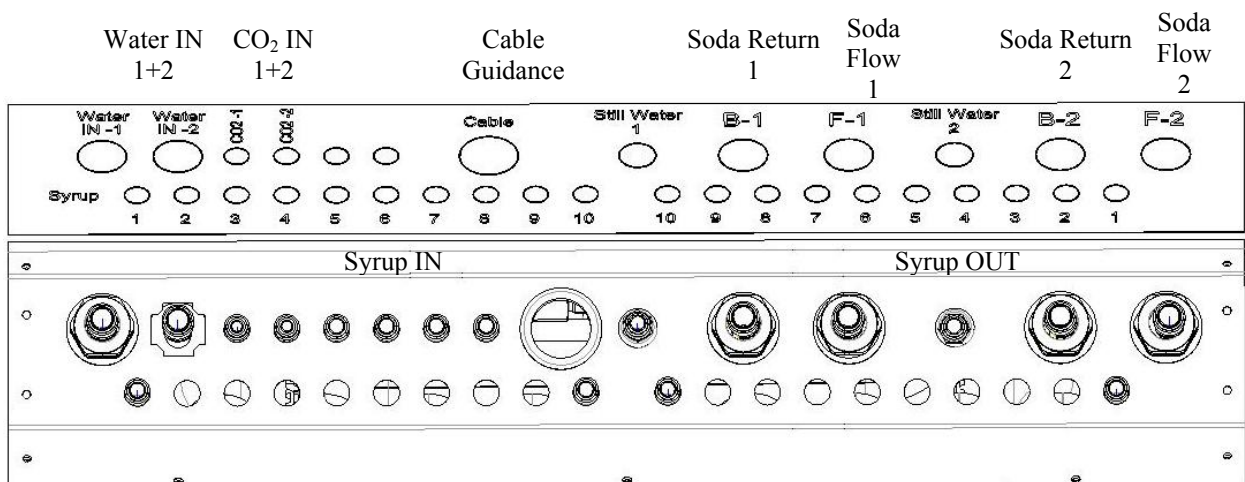
Energize 2



Energize 3 and Energize 4



Energize 5



11. Problems and Troubleshooting

Before looking for problems with the dispensing equipment, first check:

Is the electricity to the device interrupted?

Is the flow of water to the device interrupted?

Are the beverage containers empty?

Is the CO₂-cylinder empty?

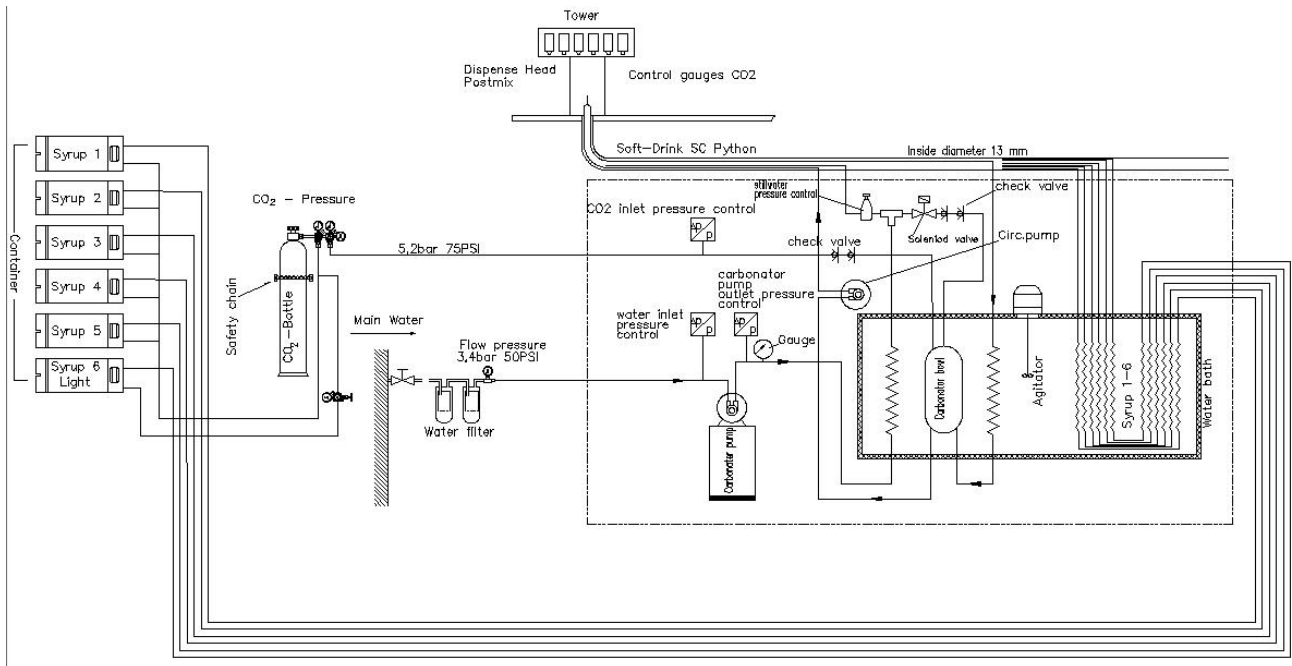
Type of problem	Cause	Remedy
Beverage too warm compressor is running	Condenser dirty	Use brush to clean condenser louvers
Beverage too warm, compressor not running	Compressor defective Electric control defective	Call service technician Check whether the carbonator motor is running; if not, call service technician
Beverage foams at a tap	Syrup stored too long	Connect with fresh product
Beverage foams at all taps	CO ₂ -pressure too high All syrups enriched with CO ₂ All beverages stored too warm Too much beverage being dispensed	Set CO ₂ pressure Connect container with fresh product Check storage temp Note out-put capacity
CO ₂ -volume in the beverage is too low	Air in carbonator Beverage dispense rate at capacity CO ₂ -cylinder empty Valve on CO ₂ -cylinder is closed Valve on pressure regulator is closed CO ₂ -pressure too low Water temperature to high	Bleed air Reduce dispense rate Change CO ₂ cylinder Open CO ₂ valve Open valve Adjust valve to pressure Ice bank used up, allow time to build new ice bank
Too much or not enough syrup in the beverage	Regulator in tap is blocked Tap is misaligned Pressure for syrup too low or to high	Call service technician Call service technician Adjust CO ₂ -pressure
Tap just outputs concentrate Note! Only with mechanical taps	Carbonator pump is not running	Check if water feed line is open Check if water flow pressure of 2 bar Check if Carbonator pump is running, if not call service technician

12. Diagnostic messages

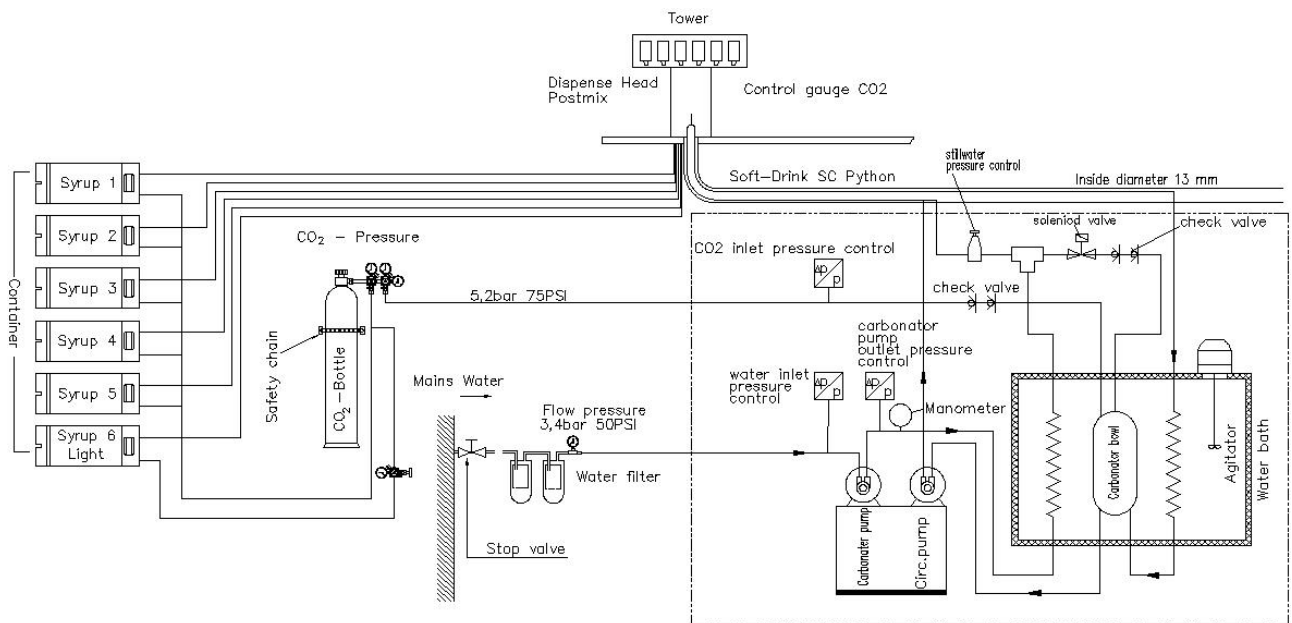
Message	Cause	Remedy
CO ₂ pressure NOK	CO ₂ inlet pressure below operating pressure of 6 bar	Check CO ₂ supply Change CO ₂ cylinder Adjust pressure regulator Check CO ₂ pressure switch Check electric connections
Carbonator pump NOK	Carbonator pump pressure below operation pressure of 10 bar	Check carbonator bowl Check CO ₂ supply Change carbonator pump Change carbonator pump motor Check Carbonator pressure switch Check electric connections
Water inlet pressure NOK	H ₂ O inlet pressure below operating pressure of 0,2 bar	Check H ₂ O supply Check electric connections
Agitator NOK	Agitator RPM speed below adjusted settings of 1570 min ⁻¹ respectively 3880 min ⁻¹	Check agitator motor Check electric connections
Water bath temperature NOK	Water bath temperature above operating temperature of or dispense rate at capacity	Check temperature probe Check electric connections Ice bank used up, allow time to build new ice bank and / or reduce dispense rate
Ambient temperature NOK	Ambient temperature above maximum specification of 40°C	Check temperature probe Check electric connection Improve room ventilation
Soda temperature NOK	Soda return temperature above operating temperature of max. 2°C, or dispense rate is at capacity	Check temperature probe Check electric connection Ice bank used up, allow time to build new ice bank and / or reduce dispense rate
Hot gas temperature NOK	Condenser temperature above operating temperature of max. 120°C	Check temperature probe Check electric connections Provide sufficient ventilation Clean condenser fins
Compressor run time		For information only
Carbonator pump run time		For information only
Voltage check NOK	Power supply out of specification	Check power supply conditions

13. Flow Charts and Circuit Diagrams

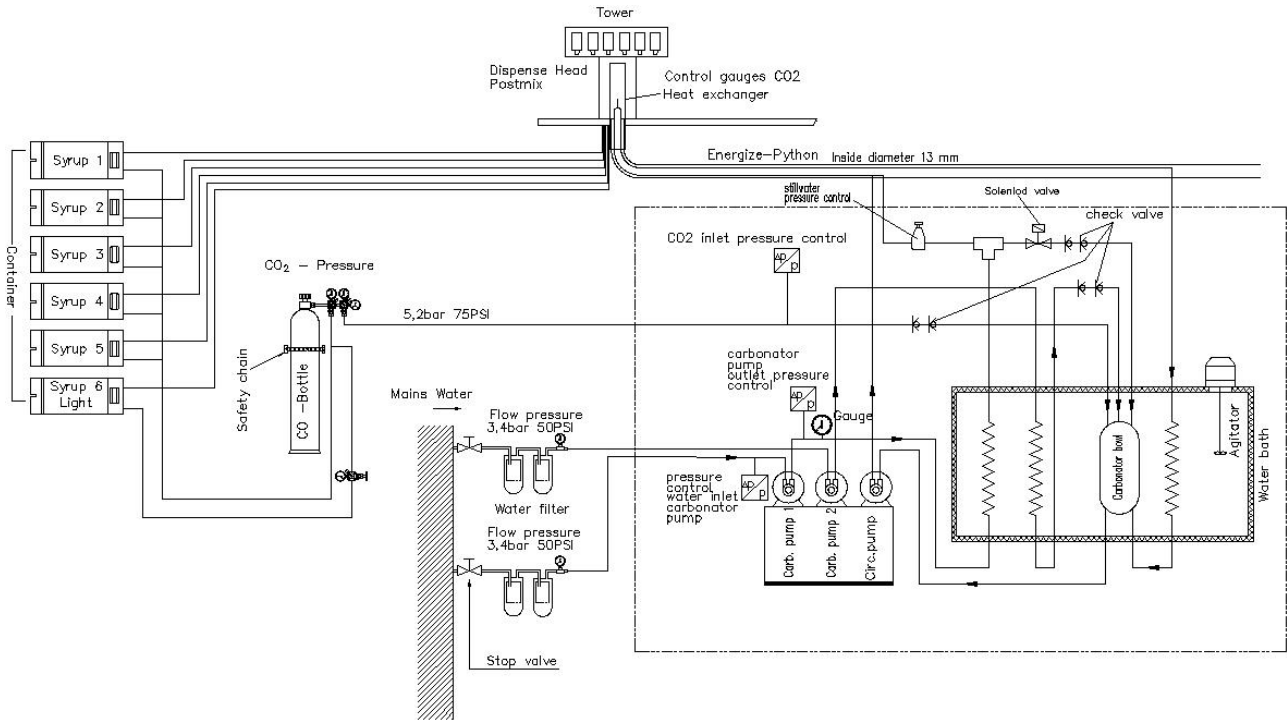
13.1 Flow Chart 148387170 Energize 2



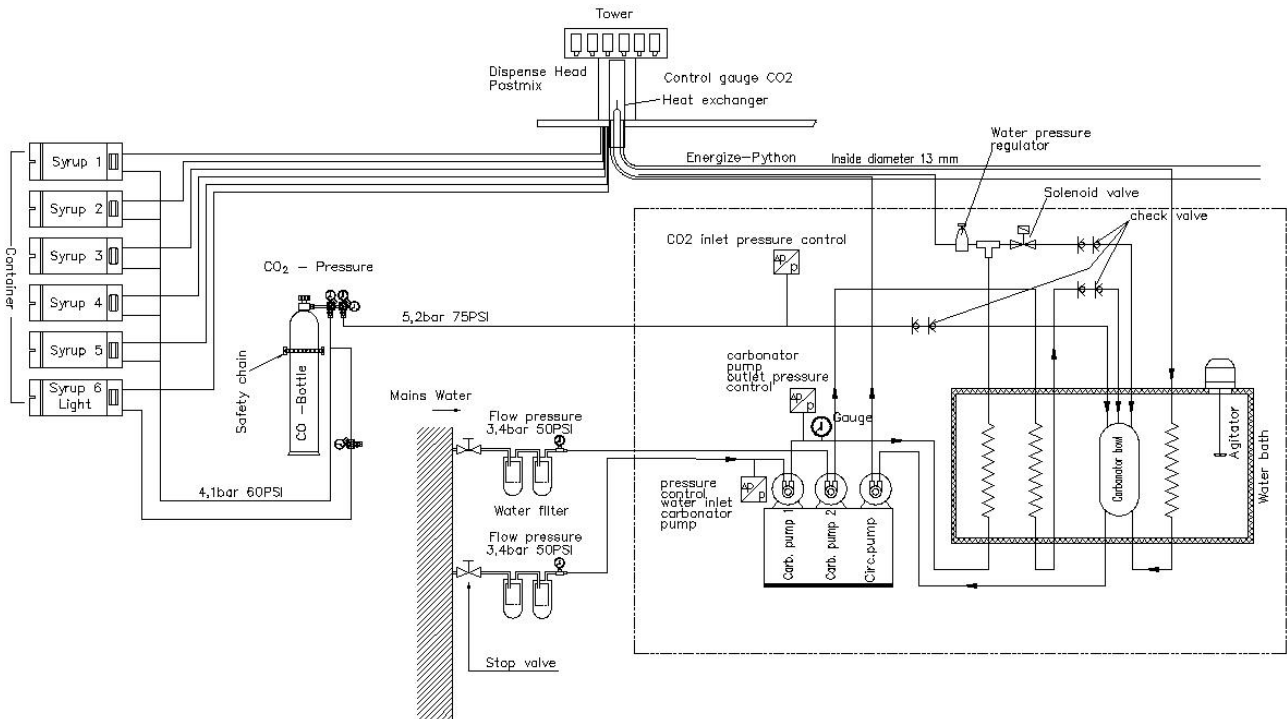
13.2 Flow Chart 142387157 Energize 3



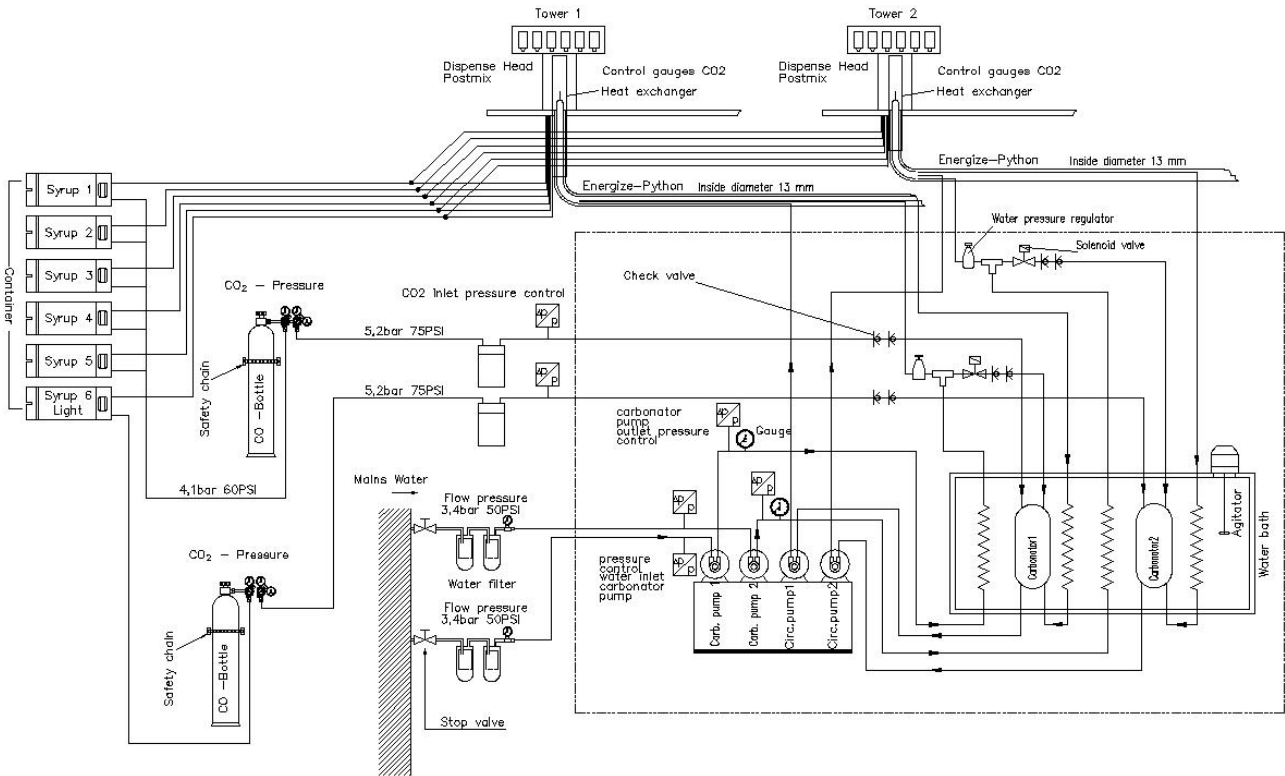
13.3 Flow Chart 142387164 Energize 4



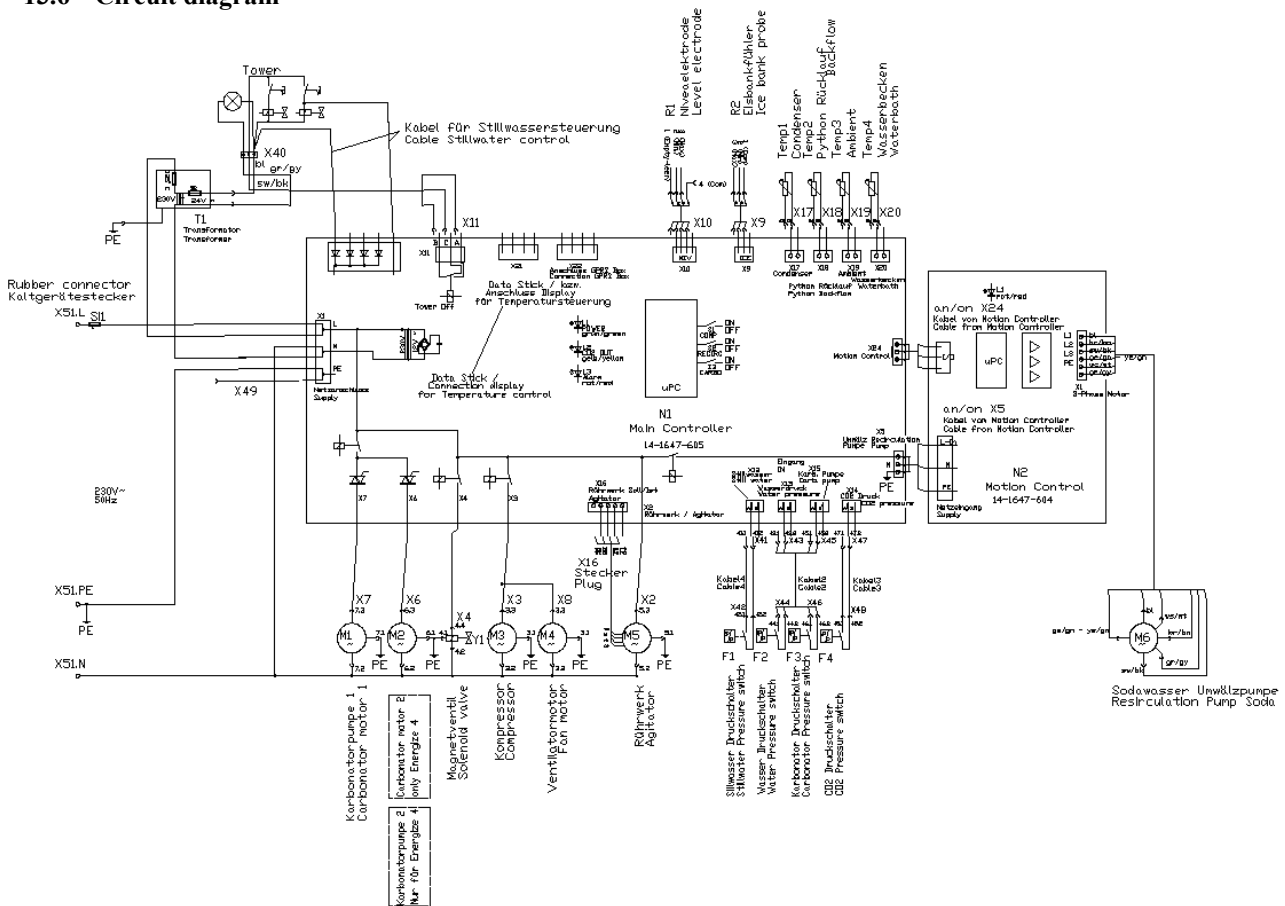
13.4 Flow Chart 142387167 Energize 5 single recirculation



13.5 Flow Chart 142387169 Energize 5 dual recirculation

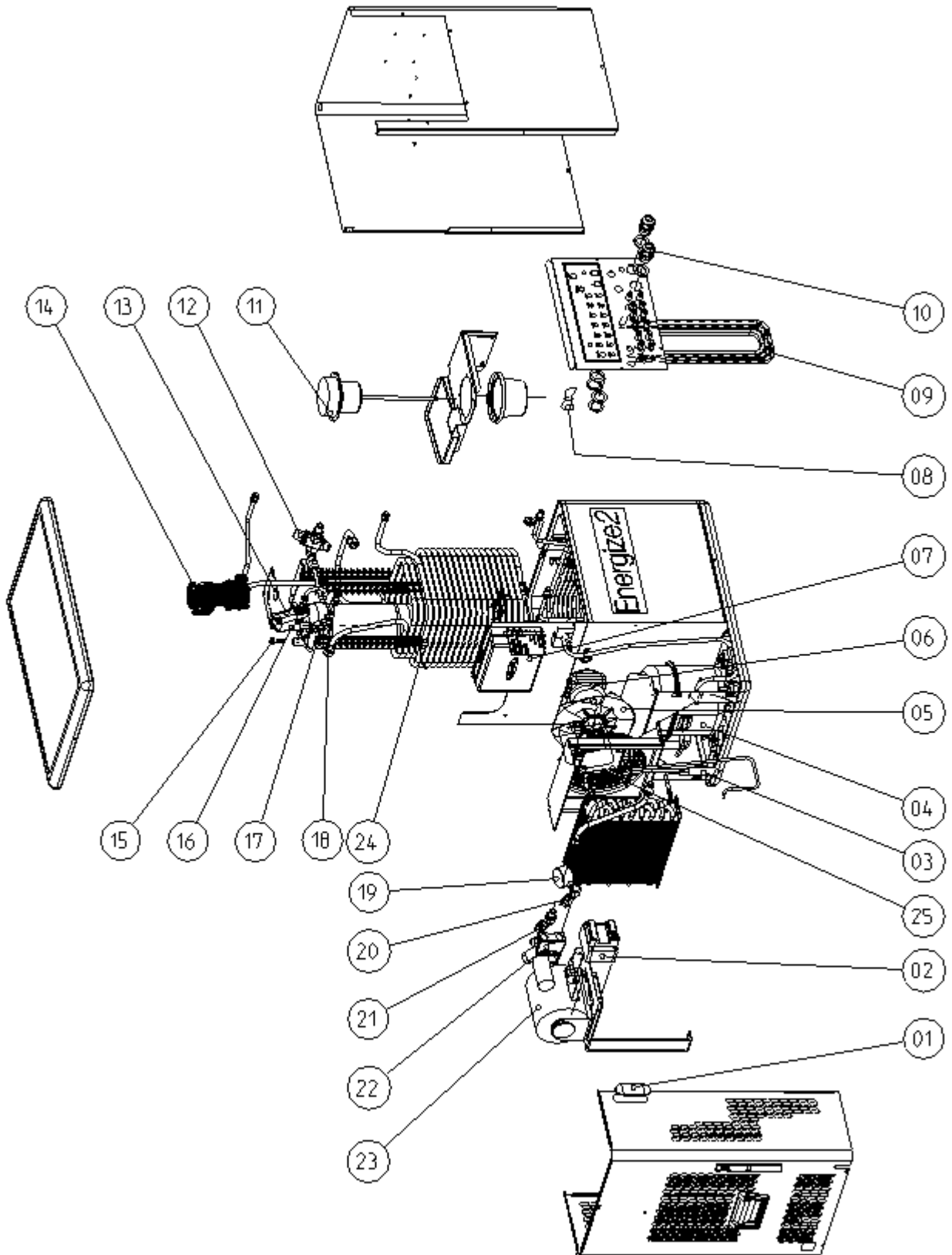


13.6 Circuit diagram



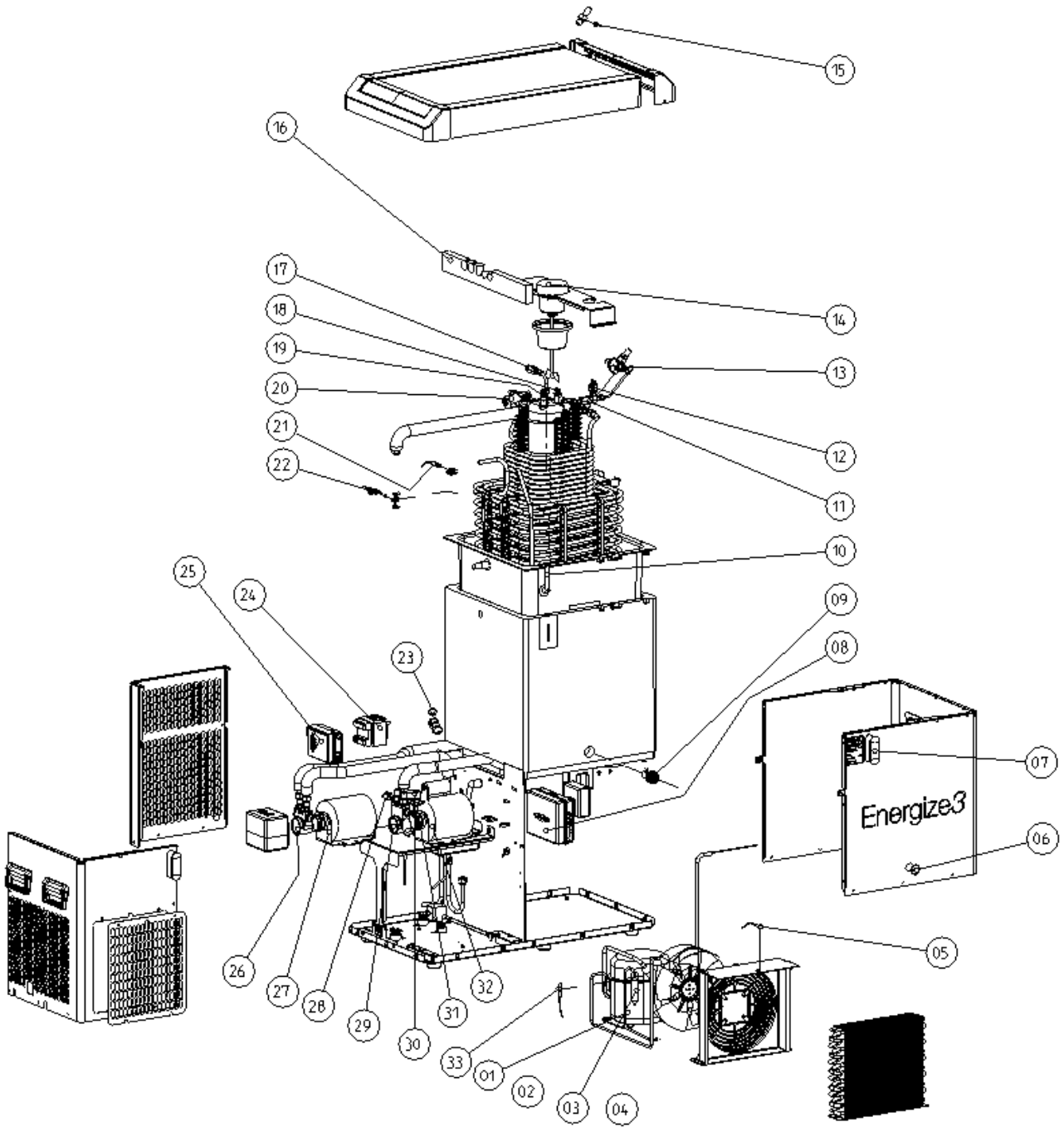
14.0 Exploded Views / Eksplozivni crteži

Energize 2



Spare Part List Energize 2 / Popis rezervnih dijelova Energize 2

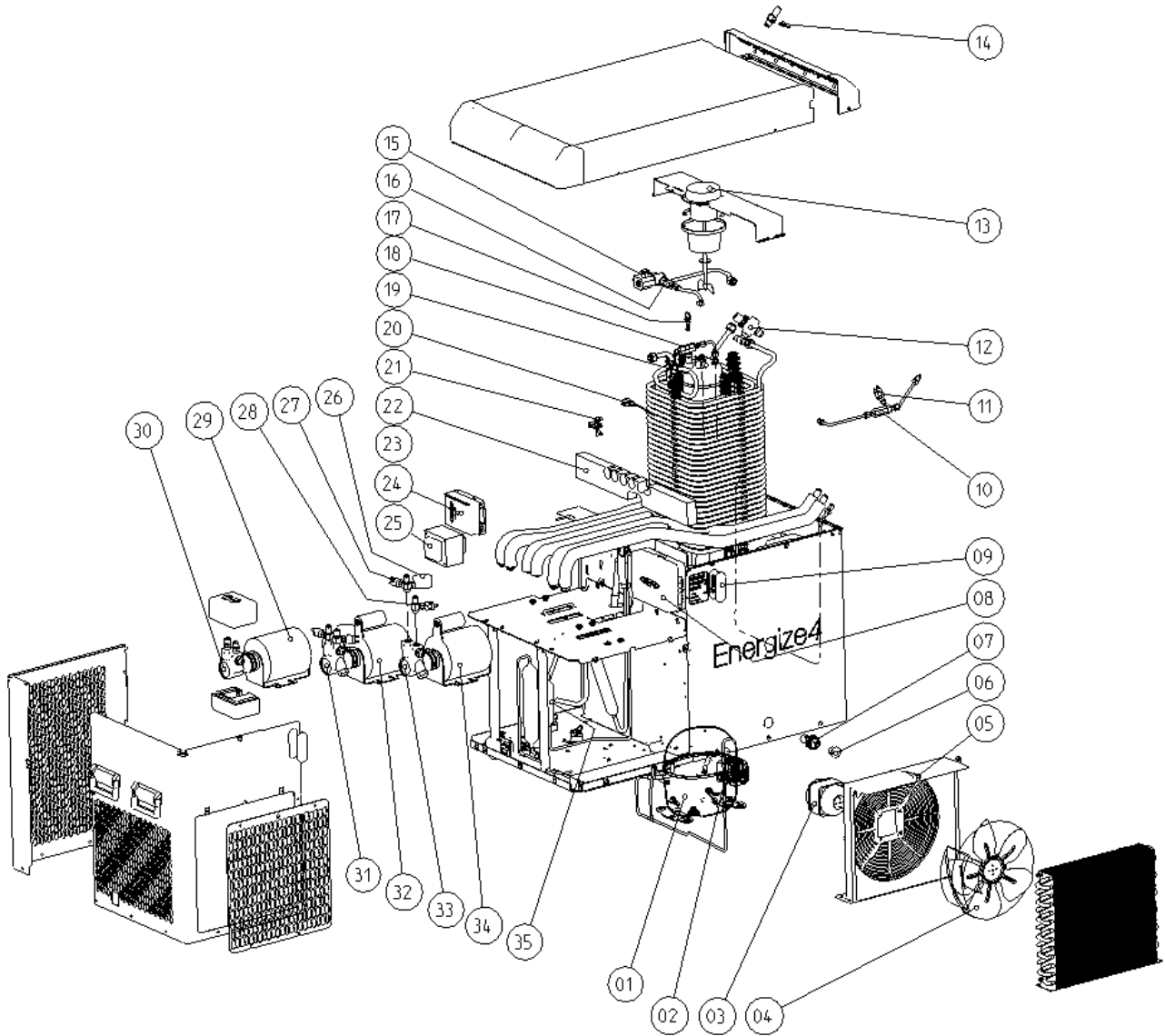
Br.	Dio-br.	Opis	Naziv	Preporučljiv Rezervni dio
1	22-0105-715	Vision Panel MC	Vision Panel MC	
2	14-1647-545	Transformator 100VA	Transformator 100VA	
3	14-9539-000	Dryer 2 x 6,1/2,5 - R134a	Sušilica 2 x 6,1/2,5 - R134a	
4	44-0000-295	Compressor KK AE4440Y 12,05 cc	Kompresor KK AE4440Y 12,05 cc	Da
5	44-0000-053	Fan blade D200mm blowing	Krila ventilatora D200mm puhajuća	
6	44-0000-007	Fan motor 6 WATT	Motor ventilatora 6W	Da
7	14-1647-605	Main Controller Energize V20	Glavni kontroler Energize V20	Da
8	14-3350-000	Propeller Ø60 M5	Krila mješalice Ø60 M5	
9	22-0107-870	Assembly Syrup	Paket sa zavojnicom za sirup	
10	22-0108-440	Assembly Insulation bushing	Ugradna grupa izolacijsko zavrtanje	
11	44-0000-115	Agitator EBM 60W	Motor mješalice 60W	Da
12	44-0000-752	Water pressure regulator G3/8"	Regulator tlaka vode G3/8"	
13	44-0000-672	Solenoid valve	Magnetni ventil	Da
14	06-0-240149	Totton pump HBM6/8 230-1-50	Crpka HBM6/8 230-1-50	Da
15	00-0001-116	Release valve Carbonator 11,2bar	Ispusni ventil karbonatora 11,2bara	
16	44-0000-802	Level probe 3-pin	3-pinska razina elektrode	
17	22-0107-389	Pressure switch CO2 IN 50/60psi	Tlačna sklopka CO2 ulaz 50/60psi	Da
18	22-0105-782	Double-check-valve CO2	Ventil za dvostruku provjeru CO2	
19	14-2440-100	Low pressure gauge 0-25bar	ND-manometar 0-25bara	Da
20	22-0107-391	Pressure switch Carb OUT 130/145psi	Tlačna sklopka karb. ISKLJUČENA 130/145psi	Da
21	22-0107-390	Pressure switch H2O IN 7/15 psi	Tlačna sklopka H2O ulaz 7/15 psi	Da
22	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
23	44-0000-842	Carbonator motor 400W-185W	Motor karbonatora 400W-185W	Da
24	22-0105-778	Probe Waterbath	Osjetnik vodene kupke	
25	22-0105-775	Probe Hot gas tube	Osjetnik vruće plinske cijevi	



Spare Part List Energize 3 / Popis rezervnih dijelova Energize 3

Br.	Dio-br.	Opis	Naziv	Preporučljiv Rezervni dio
1	44-0000-291	Compressor KK AE9437Y-SR 18cc	Kompresor KK AE9437Y-SR 18cc	Da
2	44-0000-007	Fan motor 6W / 230V 50Hz	Motor ventilatora 6W / 230V 50Hz	Da
3	14-9539-000	Dryer 2 x 6,1/2,5 - R134a	Sušilica 2 x 6,1/2,5 - R134a	
4	44-0000-058	Fan D250mm sucking	Krila ventilatora D250mm usisavajuća	
5	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	
6	22-0106-407	Cap 22,0-25,5	Pokrivna kapica 22,0-25,5	
7	22-0105-715	Vision Panel MC	Vision Panel MC	
8	14-1647-605	Main Controller Energize V20	Glavni kontroler Energize V20	Da
9	22-0105-890	Drain Assy Energize	Odvod Energize-a	
10	22-0106-425	Floating ball Water-level-indicator	Kuglica za prikaz vodostaja u Energize-u	
11	22-0105-782	Double-check-valve CO2	Ventil za dvostruku provjeru CO2	
12	22-0107-389	Pressure switch CO2 IN 50/60psi	Tlačna sklopka CO2 ulaz 50/60psi	Da
13	44-0000-752	Water pressure regulator G3/8"	Regulator tlaka vode G3/8"	
14	44-0000-121	Agitator Motor	Motor mješalice	Da
15	22-0105-776	Probe Soda return	Osjetnik za povratnu sodu	
16	22-0107-903	Seperator wall 1	Pregrada 1	
17	22-0105-624	Double-check-valve Water	Ventil za dvostruku provjeru vode	
18	44-0000-802	Level probe 3-pin	3-pinska razina elektrode	
19	00-0001-116	Release valve Carbonator 11,2bar	Ispusni ventil karbonatora 11,2bara	
20	44-0000-672	Solenoid valve	Magnetni ventil	Da
21	22-0105-778	Probe Waterbath	Osjetnik vodene kupke	
22	22-0108-337	Assembly Ice bank probe	Ugradna grupa osjetnik banke leda	
23	22-0046-965	Cable 24V customer-supply	Kabel 24V strana za klijente	
24	14-1647-545	Tranformator 100VA	Tranformator 100VA	
25	14-1647-604	Motion Control for 3x180V motor	Kontrola kretanja za 3x180V motor	Da
26	44-0000-771	Water pump 100GPH VA	Vodena crpka 100 GPH VA	Da
27	44-0000-838	Pump motor 3x180V 50Hz 3Ph	Motor crpke 3x180V 50Hz 3Ph	Da
28	22-0107-391	Pressure switch Carb OUT 130/145psi	Tlačna sklopka karb. ISKLJUČENA 130/145psi	Da
29	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
30	14-2440-100	Low pressure gauge 0-25bar	ND-manometar 0-25bara	Da
31	22-0107-390	Pressure switch H2O IN 7/15 psi	Tlačna sklopka H2O ulaz 7/15 psi	Da
32	44-0000-842	Carbonator motor 400W-185W	Motor karbonatora 400W-185W	Da
33	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	

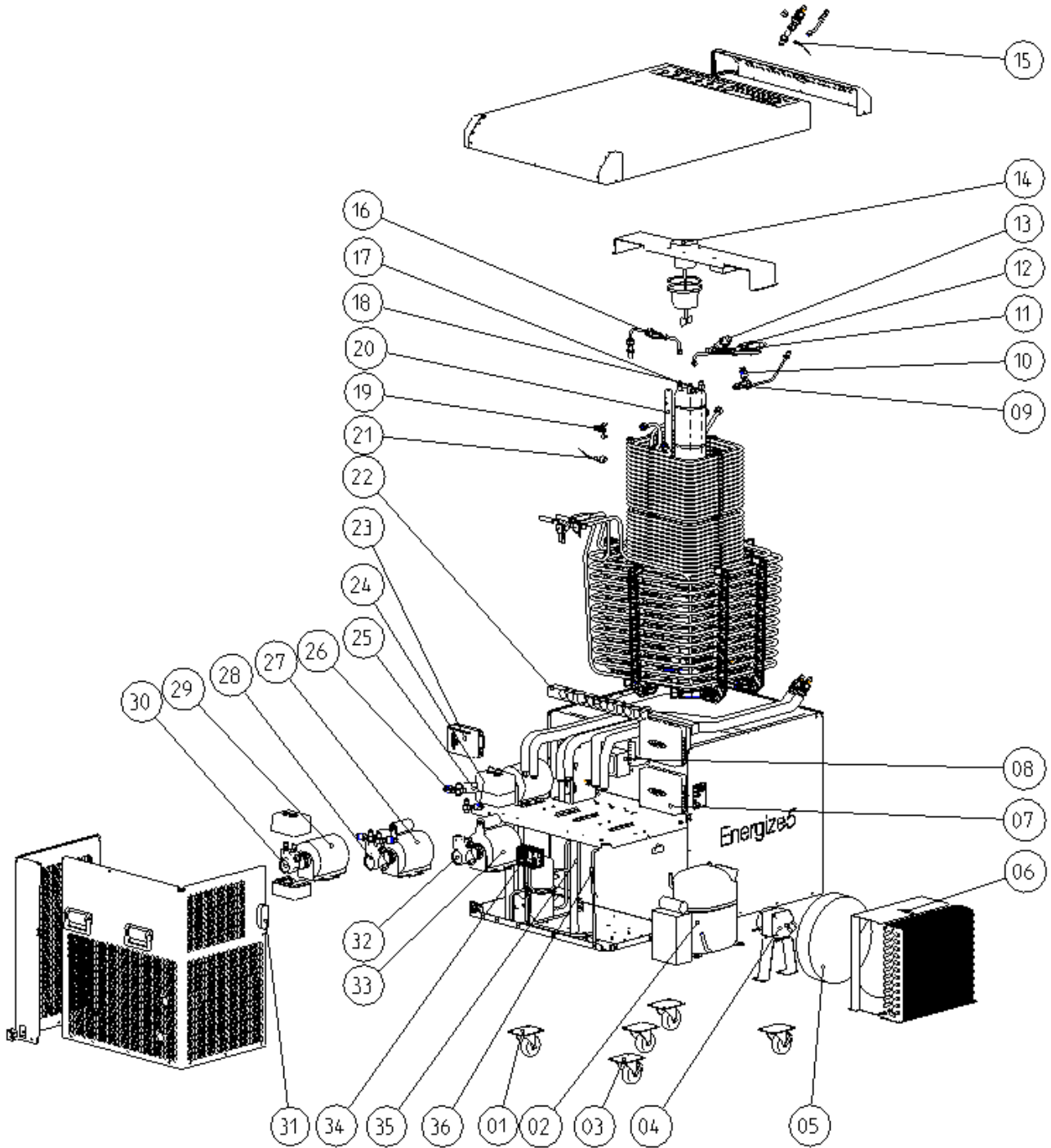
Energize 4



Spare Part List Energize 4 / Popis rezervnih dijelova Energize 4

Br.	Dio-br.	Opis	Naziv	Preporučljiv Rezervni dio
1	44-0000-289	Compressor ACC GX23TB 230V 50 Hz	Kompresor ACC GX23TB 230V 50Hz	Da
	44-0000-262	Compressor CAJ 4476 Y 220V 60Hz	Kompresor CAJ 4476 Y 220V 60Hz	Da
2	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	
3	44-0000-009	Fan Motor 25 WATT	Motor ventilatora 25 WATT	Da
4	44-0000-060	Fan D275mm sucking	Krila ventilatora D275mm usisavajuća	
5	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	
6	22-0106-407	Cap 22,0-25,5	Pokrivna kapica 22,0-25,5	
7	22-0105-890	Drain Assy Energize	Odvod Energize-a	
8	14-1647-605	Main Controller Energize V20	Glavni kontroler Energize V20	Da
9	22-0105-715	Vision Panel MC	Vision Panel MC	
10	22-0105-782	Double-check-valve CO2	Ventil za dvostruku provjeru CO2	
11	22-0107-389	Pressure switch CO2 IN 50/60psi	Tlačna sklopka CO2 ulaz 50/60psi	Da
12	44-0000-752	Water pressure regulator G3/8"	Regulator tlaka vode G3/8"	
13	44-0000-121	Agitator Motor	Motor mješalice	Da
14	22-0105-776	Probe Soda return	Osjetnik za povratnu sodu	
15	44-0000-672	Solenoid valve	Magnetni ventil	
16	22-0105-624	Double-check-valve Water	Ventil za dvostruku provjeru vode	
17	00-0001-116	Release valve Carbonator 11,2bar	Ispusni ventil karbonatora 11,2bara	
18	22-0106-873	Double-check-valve Water	Ventil za dvostruku provjeru vode	
19	22-0096-822	Level probe with cable	Elektroda s kabelom	
20	22-0105-778	Probe Waterbath	Osjetnik vodene kupke	
21	22-0108-442	Assembly Ice bank probe	Ugradna grupa osjetnik banke leda	
22	22-0107-927	Seperator wall 1	Pregrada 1	
23	22-0046-965	Cable 24V customer-supply	Kabel 24 strana za klijente	
24	14-1647-604	Motion Control for 3x180V motor	Kontrola kretanja za 3x180V motor	Da
25	22-0107-889	Tranformator 200VA	Tranformator 200VA	
26	14-2440-100	Low pressure gauge 0-25bar	ND-manometar 0-25bara	Da
27	22-0107-391	Pressure switch Carb OUT 130/145psi	Tlačna sklopka karb. ISKLJUČENA 130/145psi	Da
28	22-0107-390	Pressure switch H2O IN 7/15 psi	Tlačna sklopka H2O ulaz 7/15 psi	Da
29	44-0000-838	Pump motor 3x180V 50Hz 3Ph	Motor crpke 3x180V 50Hz 3Ph	Da
30	44-0000-771	Water pump 100GPH VA	Vodena crpka 100 GPH VA	Da
31	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
32	44-0000-842	Carbonator motor 400W-185W 50Hz	Motor karbonatora 400W-185W 50Hz	Da
	14-9590-845	Carbonator motor 400W-185W 60Hz	Motor karbonatora 400W-185W 60Hz	Da
33	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
34	44-0000-842	Carbonator motor 400W-185W 50Hz	Motor karbonatora 400W-185W 50Hz	Da
	14-9590-845	Carbonator motor 400W-185W 60Hz	Motor karbonatora 400W-185W 60Hz	Da
35	14-9539-000	Dryer 6, 1/6, 1 - R134a	Sušilica 6, 1/6, 1 - R134a	

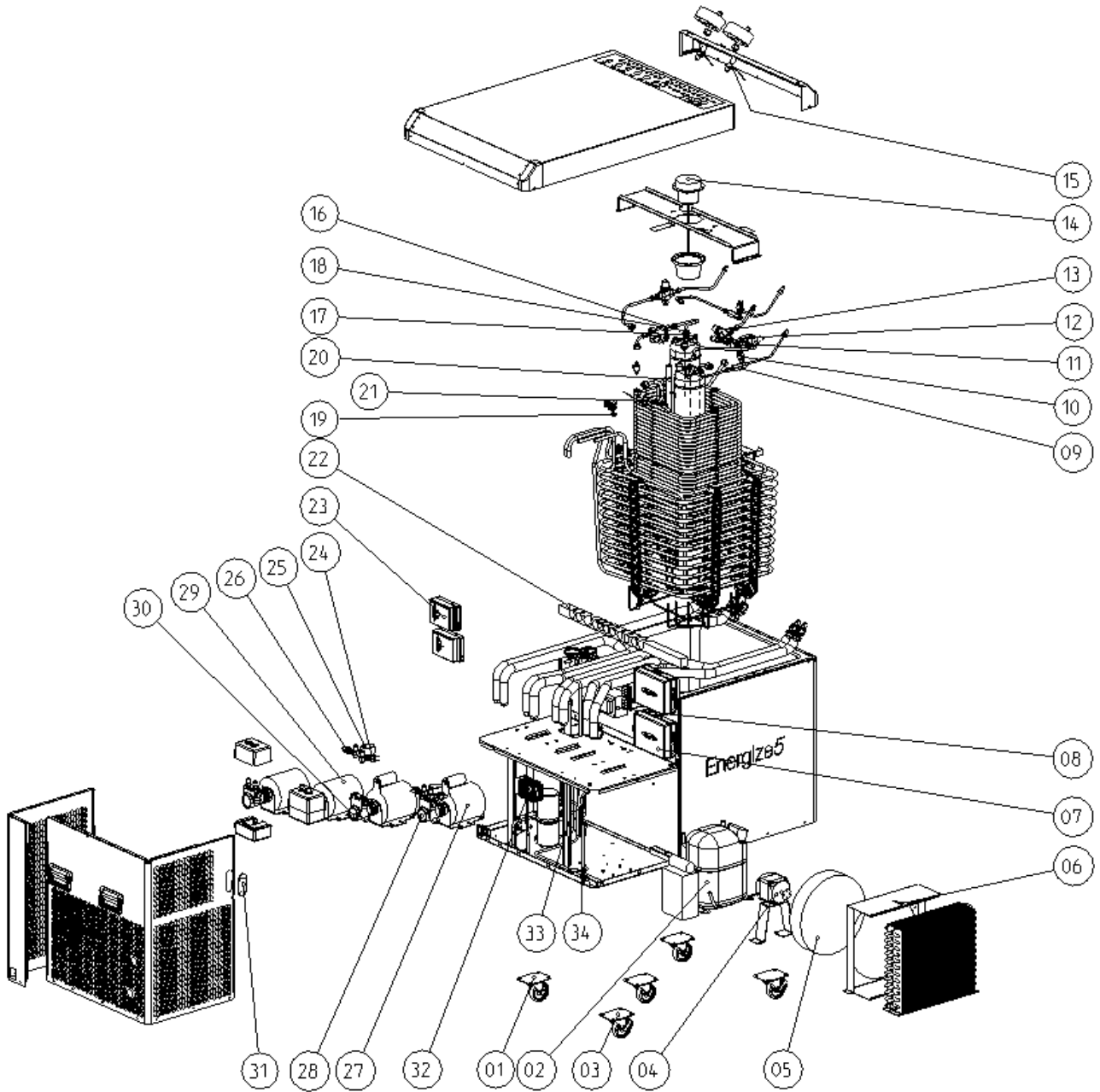
Energize 5 single karbonator



Spare Part List Energize 5 Single Carbonator / Popis rezervnih dijelova Energize 5 single karbonator

Br.	Dio-br.	Opis	Naziv	Preporučljiv Rezervni dio
1	22-0107-782	Castor lockable	Kotač koji se uglavljuje	
2	44-0000-236	Compressor GS 34 TB 230V 50Hz	Kompresor GS 34 TB 230V 50Hz	Da
	44-0000-263	Compressor CAJ 4511 220V 60Hz	Kompresor CAJ 4511 220V 60Hz	Da
3	22-0107-781	Castor	Kotač	
4	44-0000-018	Fan motor 34W 230V 50/60Hz	Motor ventilatora 34W 230V 50/60Hz	Da
5	44-0000-061	Fan blade 300mm sucking	Krila ventilatora 300mm usisavajuća	
6	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	
7	14-1647-605	Main Controller Energize V20	Glavni kontroler Energize V20	Da
8	22-0107-889	Tranformator 200VA	Tranformator 200VA	
9	22-0105-782	Double-check-valve CO2	Ventil za dvostruku provjeru CO2	
10	22-0107-389	Pressure switch CO2 IN 50/60psi	Tlačna sklopka CO2 ulaz50/60psi	Da
11	22-0105-624	Double-check-valve Water	Ventil za dvostruku provjeru vode	
12	44-0000-672	Solenoid valve	Magnetni ventil	Da
13	44-0000-752	Water pressure regulator G3/8"	Regulator tlaka vode G3/8"	
14	44-0000-121	Agitator Motor	Motor mješalice	Da
15	22-0105-776	Probe Soda return	Osjetnik za povratnu sodu	
16	22-0106-873	Double-check-valve Water	Ventil za dvostruku provjeru vode	
17	00-0001-116	Release valve Carbonator 11,2bar	Ispusni ventil karbonatora 11,2bara	
18	22-0096-822	Level probe with cable	Elektroda s kabelom	
19	22-0108-442	Assembly Ice bank probe	Ugradna grupa osjetnik banke leda	
20	22-0108-400	Drain tube	Odvodna cijev	
21	22-0105-778	Probe Waterbath	Osjetnik vodene kupke	
22	22-0108-288	Seperator wall 1	Pregrada 1	
23	14-1647-604	Motion Control for 3x180V motor	Kontrola kretanja za 3x180V motor	Da
24	22-0107-390	Pressure switch H2O IN 5/10 psi	Tlačna sklopka H2O ulaz 5/10 psi	Da
25	14-2440-100	Low pressure gauge 0-25bar	ND-manometar 0-25bara	Da
26	22-0107-391	Pressure switch Carb OUT 130/145psi	Tlačna sklopka karb. ISKLJUČENA 130/145psi	Da
27	44-0000-842	Carbonator motor 400W-185W	Motor karbonatora 400W-185W	Da
28	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
29	44-0000-838	Pump motor 3x180V 50Hz 3Ph	Motor crpke 3x180V 50Hz 3Ph	Da
30	44-0000-771	Water pump 100GPH VA	Vodena crpka 100 GPH VA	Da
31	22-0105-715	Vision Panel MC	Vision Panel MC	
32	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
33	44-0000-842	Carbonator motor 400W-185W 50Hz	Motor karbonatora 400W-185W 50Hz	Da
	14-9590-845	Carbonator motor 400W-185W 60Hz	Motor karbonatora 400W-185W 60Hz	Da
34	14-7051-000	Pressostat KP 7 W	Presostat KP 7 W	
35	14-7047-134	Dryer 8,1/8,1 - R134a	Sušilica 8,1/8,1 - R134a	
36	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	

Energize 5 dual karbonator



Spare Part List Energize 5 Dual Carbonator / Popis rezervnih dijelova Energize 5 dual karbonator

Br.	Dio-br.	Opis	Naziv	Preporučljiv Rezervni dio
1	22-0107-782	Castor lockable	Kotač koji se uglavljuje	
2	44-0000-236	Compressor GS 34 TB 230V 50Hz	Kompresor GS 34 TB 230V 50Hz	Da
	44-0000-263	Compressor CAJ 4511 220V 60Hz	Kompresor CAJ 4511 220V 60Hz	Da
3	22-0107-781	Castor	Kotač	
4	44-0000-018	Fan motor 34W 230V 50/60Hz	Motor ventilatora 34W 230V 50/60Hz	Da
5	44-0000-061	Fan blade 300mm sucking	Krila ventilatora 300mm usisavajuća	
6	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	
7	14-1647-605	Main Controller Energize V20	Glavni kontroler Energize V20	Da
8	22-0107-889	Tranformator 200VA	Tranformator 200VA	
9	22-0105-782	Double-check-valve CO2	Ventil za dvostruku provjeru CO2	
10	22-0107-389	Pressure switch CO2 IN 50/60psi	Tlačna sklopka CO2 ulaz 50/60psi	Da
11	22-0105-624	Double-check-valve Water	Ventil za dvostruku provjeru vode	
12	44-0000-672	Solenoid valve	Magnetni ventil	Da
13	44-0000-752	Water pressure regulator G3/8"	Regulator tlaka vode G3/8"	
14	44-0000-121	Agitator Motor	Motor mješalice	Da
15	22-0105-776	Probe Soda return	Osjetnik za povratnu sodu	
16	22-0106-873	Double-check-valve Water	Ventil za dvostruku provjeru vode	
17	00-0001-116	Release valve Carbonator 11,2bar	Ispusni ventil karbonatora 11,2bara	
18	22-0096-822	Level probe with cable	Elektroda s kabelom	
19	22-0108-442	Assembly Ice bank probe	Ugradna grupa osjetnik banke leda	
20	22-0108-400	Drain tube	Odvodna cijev	
21	22-0105-778	Probe Waterbath	Osjetnik vodene kupke	
22	22-0108-288	Seperator wall 1	Pregrada 1	
23	14-1647-604	Motion Control for 3x180V motor	Kontrola kretanja za 3x180V motor	Da
24	22-0107-390	Pressure switch H2O IN 5/10 psi	Tlačna sklopka H2O ulaz 5/10 psi	Da
25	14-2440-100	Low pressure gauge 0-25bar	ND-manometar 0-25bara	Da
26	22-0107-391	Pressure switch Carb OUT 130/145psi	Tlačna sklopka karb. ISKLJUČEN 130/145psi	Da
27	44-0000-842	Carbonator motor 400W-185W	Motor karbonatora 400W-185W	Da
28	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
29	44-0000-838	Pump motor 3x180V 50Hz 3Ph	Motor crpke 3x180V 50Hz 3Ph	Da
30	44-0000-771	Water pump 100GPH VA	Vodena crpka 100 GPH VA	Da
31	22-0105-715	Vision Panel MC	Vision Panel MC	
32	44-0000-761	Water pump 100 GPH MS	Vodena crpka 100 GPH MS	Da
33	44-0000-842	Carbonator motor 400W-185W 50Hz	Motor karbonatora 400W-185W 50Hz	Da
	14-9590-845	Carbonator motor 400W-185W 60Hz	Motor karbonatora 400W-185W 60Hz	Da
34	14-7051-000	Pressostat KP 7 W	Presostat KP 7 W	
35	14-7047-134	Dryer 8,1/8,1 - R134a	Sušilica 8,1/8,1 - R134a	
36	22-0105-775	Probe Hot gas / Ambient	Osjetnik vrućeg plina / okoline	